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LETTERS AND CERTIFICATES,
RECOMMENDING
THE
PATENT PORTABLE WARM
AND
HOT BATH.

TO WHICH ARE ADDED EXPLANATIONS

OF THE

NATURE OF THE REMEDY,

AND

INSTRUCTIONS

FOR ITS

APPLICATION;

DESIGNATING SOME OF THE CASES IN WHICH IT WILL BE
PARTICULARLY BENEFICIAL, FOR THE USE OF
FAMILIES.

By *SAMUEL K. JENNINGS, Patentee.*

NORFOLK:

PRINTED FOR THE AUTHOR,

By

S. DILLWORTH & C. KEEMLE,

1816.

District of Virginia, to wit:

BE IT REMEMBERED, that on the ninth day of October, L. S. ber, in the fortieth year of American independence, Samuel K. Jennings of the said district, hath deposited in this office the title of a book, the right whereof he claims as author, in the words following, to wit: "Letters and Certificates recommending the Patent Portable Warm and Hot Bath. To which are added explanations of the nature of the remedy, and instructions for its application. Designating some of the Cases in which it will be particularly beneficial for the use of families. By Samuel K. Jennings, *Patentee*." In conformity to the act of Congress of the United States, entitled "An act for the encouragement of learning, by securing the copies of maps, charts, and books, to the authors and proprietors of such copies, during the times therein mentioned;" and also an act, entitled "An act supplementary to an act, entitled "An act for the encouragement of learning, by securing the copies of maps, charts, and books, to the authors and proprietors of such copies during the times therein mentioned; and extending the benefits thereof to the arts of designing, engraving, and etching historical and other prints."

SETH FOSTER,
Clerk of the district of Virginia, Norfolk.

LETTERS & CERTIFICATES, &c.

ABOUT twelve years ago, I was convinced, that there was too much uncertainty in every theory of fever of which I had any knowledge. They all failed to furnish such explanation, of the grades and states of disease, as I deemed necessary, to guard against mistake. I entered upon a course of vigilant observation, in order to detect any important point at which our science might be deficient. Two whole years were spent without gaining any considerable advantage. At length, however, several cases of fever occurred, of unusual type, difficult to manage, and attended with symptoms which invited special attention to the surface of the patient, and leading to the adoption of opinions, which afterwards were tested by additional experience, and corrected or established as facts directed.

In the year of 1806-7, a similar fever prevailed, to an extent never before known in our section of the country. Several hundreds of the sick were committed to my management, affording me an ample opportunity for repeating my observations. In the course of this labor, my enquiries began to assume a more systematic form; and ever since that period my practice has been considerably guided by the same principles. For the space of nine years past, I have continued to pay much attention to the surface, and have much used artificial heat. The steam of boiling water has often served me a valuable purpose, when my patient could set up to receive it. In cases of prostration, this, of course, became impracticable; and the moisture which always accompanied it, too much counteracted my intention, even when the condition of the patient was favorable.—— From time to time, therefore, different devices were tried for the production and application of heat, freed from this inconvenience. Each expedient was more or less beneficial, according to the facility and extent with which it could be accomplished, and a perfect method of applying dry heat, became more and more desirable. At length I had the happiness to hit upon the gas of burning ardent spirit, and the invention of a portable apparatus for conducting it to my patient.

And having now fully ascertained by a very great number of experiments, carefully made under my own observation, that a few decisive applications of the patent, portable warm and hot

Bath, with little or no other aid, will almost invariably be effectual for correcting predisposition to disease; that by the same method, recent disease, when actually formed, may be cured in the same decisive way; that the treatment thus far requires no considerable part of skill but the necessary decision; no caution but such as common sense will dictate; and that in the hands of physicians it places within the reach of the healing art, many cases of disease which for ages have been a reproach to the profession.—It, therefore, becomes a duty incumbent on me to take measures for bringing it into general use. Many difficulties oppose my purpose: but the neglect of a profitable establishment; absence from my family; labor, expense, &c. will be deemed inconsiderable, if I can be supported by the approbation of enlightened medical men—a goodly number of whom have gladly received and given their sanction to a discovery which promises much for the alleviation of the sufferings of humanity.

But the slow progress of improvement in the healing art, has had a peculiar effect upon many enlightened men. It has had injurious influence over the minds of some, who in every other respect deserve the highest estimation. It has imperceptibly produced a strong inclination to look back for authority however dark and absurd, rather than make patient and candid observation upon facts, in search after truth. In too many instances it has insidiously infused a spirit of pedantry into the minds of those who are truly learned—and by the superficial this weakness is too often imitated, because it is easier to put on the air of mystery and importance than to trace that labyrinth of investigation, whose outermost courts they have never trodden. Others, who without an intention to be arrogant, feel as if the people ought to look to them for instruction. Improvements in the art to which they can have no claim, must, therefore, eclipse their importance; and with their pride thus piqued, without waiting to reason upon the subject, all their feelings are concentrated in a fixed resolution to put down the cause of their troubles. Such was the storm which was raised for the destruction of the great Sydenham of London! Such too the struggle intended to overturn the herculean labors of that great physician and philosopher who lately enlightened and graced the city of Philadelphia!—Blinded interest too creeps in, and false fears of future loss are raised, so that every benevolent emotion is suppressed. Commiseration at human woe is no longer felt or felt in vain! This ruthless passion can witness destructive scenes of sickness, pain, and death, rather than hazard the possible loss of sordid gain. I am nevertheless firmly supported by the reflection, that truth is necessarily imperishable. It may be opposed and even suppressed for a season, but it will ultimately break forth in all

its native splendor, and enlighten the world. Such was the fact in the memorable Wilberforce's motion before the parliament of England, to put an end to the slave trade. "It fell dead from his lips." Some thirty years afterwards it was taken up and this odious trade in human souls forever abolished. I therefore still flatter myself, that as every physician must know the importance of heat in the cure of disease, and as all must have experienced the difficulties which attend its application in any ordinary way, that many will avail themselves of the use of my apparatus.— Could this plan yet succeed, by observing its decisive effect, they would necessarily discover the truth of those principles which I shall ultimately establish. With this view, I now make my last appeal to those noble souls in the medical world, who are ready to see and embrace the truth, and I call to my aid scientific men of every order in society. The success which attended a similar effort on a former occasion, gives me the greater courage in this attempt.

In the year 1814, having the advantage of a personal acquaintance with Thomas Gholson, esquire, I forwarded my pamphlet to him, accompanied by a letter, signifying the good effect the Bath would have in the cure of disease as incident to the army.

Doctor James Tilton, physician and surgeon general of the armies of the United States, a man of much independent worth, happened to lodge in the same house with Mr. Gholson, and was immediately made acquainted with my views. In a few days the physician general obtained permission from the honorable John Armstrong, secretary of war, and I was invited to the seat of government. On my arrival I had the satisfaction to find that preparatory measures were already in train for the accomplishment of my wishes. The final arrangement and the result of the proceeding, will be seen in the sequel.

For this polite and and highly respectable introduction to the city, and the agreeable facility with which I was permitted to negotiate the contemplated visit to the hospital at Norfolk, the honorable secretary of war and surgeon general, are entitled to my highest regard and most grateful acknowledgements. But they will receive a more lasting reward in the blessings which this system, aided by their patronage, will eventually secure to succeeding generations.

Wilmington, (Delaware) July 16, 1814.

DEAR SIR,

Agreeably to your request, I have no hesitation in giving you my sense of the utility of your newly invented hot and

warm Bath, in the cure of diseases. I can only speak in general terms on a subject so novel; and, perhaps, the best method I can take for communicating my thoughts and reflections on the subject, is, by recounting the measures taken by the hospital department for the investigation of its usefulness.

Conformably to an order from the secretary of war, I was directed to make the necessary arrangements for your admission to the hospital at Norfolk. By the same order, I was directed to send doctor Hays, an hospital surgeon of great respectability, to assist and be witness at the experiments. The doctor reported favorably, and in that correct manner which gratified the secretary of war, as well as myself. He particularly recommends it in regimental practice, "from the opportunity of meeting disease in its early stages." He recommends it in fevers, languid excitement of the surface, and diseases produced by suppressed perspiration. The doctor made experiments on about thirty cases, very much to his satisfaction, but has not exhausted the subject.

I have seen the Bath applied in a few instances; and have had it applied to my own person. The ease and facility of the application, and the delightful sensations it affords, are greatly in favor of its general use. And when we consider the nervous and sensible quality of the skin, and the importance of this emunctory, a flood of argument must arise, for the application of remedies to the surface of the body.

In the promised edition of your *explanations*, &c. besides the theory and direction for correct application, permit me to request that you will, by every possible precaution, guard us against the wrong application of so important a remedy.

With great respect, I am dear sir,

Your friend and humble servant,

JAMES TILTON.

Doctor S. K. Jennings.

Washington City, April 7, 1814.

DEAR SIR,

Conformably to the orders of the secretary of war, you will be pleased to accompany doctor Adam Hays, an hospital surgeon, to Norfolk, in Virginia, and communicate to him and the surgeons generally, of that post, not only the principles of your newly invented *bath*, but the method of application; taking care not only to show the cases in which it may be applied to advantage, with the manner, duration, &c. but especially to guard them against the misapplication, so as not to bring an useful remedy into discredit.

Agreeably to the secretary's order, your account for expences, &c. may be presented at any time.

I am, dear sir, very respectfully,

Your most obedient servant,

(Signed)

JAMES TILTON, P. S. G.

May 5, 1814.

This may certify, that, in obedience to an order of the honorable secretary of war, and in conformity to the instructions of the physician and surgeon general of the United States, Dr. Samuel K. Jennings has accompanied me at the post of Norfolk, Virginia, and satisfactorily demonstrated to me the principles and mode of making the application of his newly invented method of curing disease in a summary way, by the means of his patent, portable warm and hot Bath.

(Signed)

A. HAYS, *Hospital Surgeon.*

Having performed this service, I determined on a visit to Philadelphia and New York. With this intention I addressed a note to the President of the United States and obtained the following letter in duplicate—the one copy addressed to Dr. Physic, the other to Dr. Samuel L. Mitchell.

Washington City, August 1814

DEAR SIR,

Doctor Jennings has a medical invention, in the value of which he feels so much confidence, that he is anxious to present it to the consideration of the most enlightened of the profession. Although a departure in some measure from an established rule, I cannot refuse a line which may promote an opportunity for the explanations by which he wishes his invention to be tested. His benevolent character is a further apology for the liberty I take.

Accept assurances of my great esteem and friendly respect.

JAMES MADISON.

Doctor Physic.

Doctor Physic was in ill health, and unable to attend to the practice. He favoured me with an interview however, and spoke very favorably of my invention.

Doctor Mitchell without having received his letter and without solicitation, enclosed under cover to the Physician General, the following letter to me, viz.

New York, March 27, 1814.

To Doctor Jennings:

I this day, excellent sir, wrote to the Physician General of the United States, my opinion on your mode of applying heat to the external surface of the human body ; and on Portio's method of directing its action upon the stomach and internal parts.

I have caused several experiments to be made with the alcoholic vapour, on the patients of the New York Hospital. I am inclined to believe it is an efficacious and valuable remedy. It is remarkably neat. Nothing can be more handy. And really it in some sort enables you to place your patient beyond the climates, where snow and frost exercise their chilling influence, to the regions where solar warmth is more uniform and elevated.

It is a most important part of your heated air, that it is free from all smoke, soot and ashes.

I have considered the spirituous decomposition chemically. I have examined the metallic apparatus mechanically. And I have witnessed the action of the rarified vapours remedially.

Considering a torpor of the skin to be a cause or accompaniment of many diseases ; and that heat is the best of all excitants ; I am well satisfied that your method of applying caloric to stimulate the cuticular surface is happily calculated to give relief in such cases, and produce extensive advantages to the sick and disabled, in many other maladies.

SAMUEL L. MITCHELL.

About six months after the receipt of the above highly satisfactory letter, Dr. Mitchell again honored me with the following most definite testimony.

New York, 29th Oct. 1815.

Dr. Samuel K. Jennings,

DEAR SIR,

Since I wrote to you and General Tilton about the Vapour Bath, I have had many opportunities of trying its practical efficacy. I am more and more satisfied with the value of the remedy. It is so neat, so cheap, so handy, and so within the reach of every body, that it surpasses every thing with which I am acquainted, for applying caloric to the external surface of the human body. It is so capable of conveying heat, so susceptible of a higher or lower temperature, and withall so well adapted to a longer or shorter continuance, that its power to be beneficial is exceedingly enlarged.

But above all, the caloric may directed to a part of the body, or to the whole body, to a robust person or to one in the lowest debility, to an adult, or to an infant, with so much ease and bene-

fit, that I really consider it one of the most happy expedients that a practitioner can employ.

For chills, torpors, and that apathy and languor of the cuticular surface, so often the forerunner or companion of fevers, it is preferable to any other mode of applying heat. The warm-bath, warm fomentations, and the vapours of hot water are very inferior to it.

The patients in our hospital are exceedingly pleased with it, and for myself, I explain it, I order it, and I recommend it.

Accept the assurances of my high esteem and regard.

SAMUEL L. MITCHELL.

Dr. Gallup of Vermont, from whom I received the following letter is an author, whose book upon the Epidemic Diseases of that state, &c. passed a very honorable review in Boston. The Medical Repository of New-York, has also given a review of the same, in which the merit of Dr. Gallup's work is handsomely acknowledged.

Woodstock, (Vt.) February 20, 1816.

DEAR SIR,

I have not the pleasure of a personal acquaintance with you, which might be agreeable; but I have become acquainted with your writings and improvement in the medical department by the politeness of Mr. Strong, the former representative from this district. He sent me your apparatus for conveying the gas of burning alcohol to the bodies of the diseased, for which I feel very thankful to him and yourself. The very first reflection on the subject carried conviction to my mind of its utility, and I could but be astonished that the use of it had never occurred to me before, considering I have been so intent on the subject of applying heat to the surface for a series of years.—I have made various trials of it in different diseases and find it a very valuable improvement.

At the time it was presented to me, I was engaged in writing on the Epidemic Diseases of this state, viz: in the summer and autumn of 1814.—I have made favorable mention of your improvement in several places in the work, as a duty I owed to society, and my acknowledgements of gratitude I now tender you.

The work I have alluded to was printed last summer at Boston, containing 420 pages octavo. It is entitled, "Sketches of Epidemic Diseases in the State of Vermont, from its first settlement to the year 1815; with a consideration of their causes, phenomena and treatment; to which are added, remarks on pulmonary consumptions."

"Force their slight bands, their secret haunts betray." By &c.
—I was astonished to discover from your writings the similarity of object and result from different trains of reflection and investigation, and in remote parts of the union. Perhaps I am going too far in saying very different modes of investigation; they seemed in many respects similar.

It would indeed, be very desirable to me if your apparatus could be circulated in this quarter.

Dear sir, with wishes for your prosperity and happiness,

I am, with due respect,

Your obd't and very humble servant,

JOSEPH A. GALLUP.

Dr. S. K. Jennings.

The following is from Dr. Thacher, a very eminent physician of Plymouth, Massachusetts, who is the author of a work, entitled the "*American New Dispensatory*," as also of another, "*Observations on Hydrophobia*," both of which have done him honor. He is at present engaged in the publication of a work, entitled "*American Domestic Medicine*," which has much excited public expectation.

Plymouth, (Mass.) March 16, 1816.

SIR,

Having been apprized that you have invented a method of communicating heat by means of a spirituous vapour bath, I take the liberty of addressing you on the subject, and the enclosed prospectus will explain my views. I am solicitous to make my intended publication a medium of every improvement and discovery relative to practical medicine, and if consistent with your arrangements, to favor me with a short sketch of the principles and utility of your method, within a few weeks, to be inserted in the appendix of my work; it will be very gratefully received, as it may promote the views of us both and at the same time, prove highly advantageous to the public.

From report, I am of opinion that your invention is extremely well calculated for the purpose intended, and that it ought to be more generally known in this part of the country. I have not been fortunate enough to meet with either your publication or apparatus, and if any arrangement could be made for the purpose, it might be in my power to extend the employment of it in this vicinity.

I am, respectfully,

Your obedient servant,

JAMES THACHER.

Dr. S. Jennings.

A copy of my pamphlets was forwarded, and extracts and observations at the discretion of the author, will probably appear in the appendix of the *American Domestic Medicine*.

About twelve months since, I was favored with the following letter from Mr. Jefferson. I give it this place in my arrangement, as intending to be guided by the nature and consistency of the testimony, regardless of dates.

Poplar Forest, Sept. 28, 1815.

DEAR SIR,

I thank you for the pamphlet you have been so kind as to send me, and I have read it with great pleasure. But when you request an opinion on it, it is more than I am able to give or form. I am not sufficiently intimate with the structure of our frame, nor yet with the medical agents which may change its condition from bad to good, or the converse, to decide between systems on which the learned in the healing art have been divided. These studies have fallen but incidentally within my attention. Your theory is ingenious, well developed, and worthy of an acute observer. But when I consider the many theories which within the last century or two have succeeded each other, all plausible, all rested on facts ingeniously applied, I am obliged to remain in indecision between them, and to say "*non nostrum inter vos tantus componere lites*." I have little doubt of the great potency of your Steam Bath; and that it will be found capable of marked efficacy in human diseases.—More time and observation may however be necessary to discriminate between the particular cases wherein it will be useful or otherwise. For in medicine, experience is the sovereign guide.—This discrimination once settled, the Steam-Bath will probably become as the kinkin, mercury, opium and other real medicaments, one of the means given us by providence for soothing our sufferings, while he permits us to stay here. Accept my share of the public acknowledgements due to your efforts for solacing our condition, and the assurance of my great esteem and respect.

THOMAS JEFFERSON.

Doctor Jennings.

Lynchburg, March 1, 1814.

DEAR SIR,

I take a pleasure in informing you that for the last five or six weeks, I have applied your portable WARM and HOT BATH with evident good effect, on a great number of my patients—in

need I think it a most valuable acquisition to the catalogue of medical agents. The principles upon which it is used, only want to be known to bring it into esteem and general use. Out of the many cases to which I applied it, for brevity's sake I will select the two following:

1. A case of hepatic state of fever.—This was a lady, who, before I was called on, had been treated in the usual way by her attending physicians—bleeding, cathartics, a blister on the part affected, antimonial mixtures, &c. had been tried.—I found her with cold extremities and surface; fixed pain about the region of the liver, attended with cough, general debility, and a feeble pulse. By the use of your Bath, and a few small doses of calomel, with pectoral febrifuges, she was soon restored to perfect health.

2. A case of inflammation of the stomach and bowels.—It was a desperate one.—This too was a female case, whom I found on visiting her, with cold extremities and surface, violent pain about the region of the stomach and upper bowels, with languor, faintness, and scarcely a perceivable pulse in the radial artery. In this situation she continued nearly two days, notwithstanding cordials, opiates, and cathartics, were administered, and a large blister was drawn upon the region of the stomach, and two upon the extremities. No passage could be procured, or general excitement raised on the surface. I applied your bath, and continued its application till a general diaphoresis was produced, and kept up for some hours, soon after which a passage was effected by ordinary means. I then used it periodically, so as to keep up the excitement on the surface till the patient was relieved. I confidently believe that this woman would have died, had it not been for the aid of your bath.

From yours respectfully,

JOHN I. CABELL.

DEAR SIR,

Having used your "*Portable Warm and Hot Bath*," with decisive advantage to several patients, I cannot but regret that any one should so far mistake your object as to suppose that you consider it a specific. Having for four years past received frequent communications from you, explanatory of your experiments and observations, upon the surface, and of the probable benefits to be derived from a more perfect method of applying heat, I am in duty bound to offer you my little influence in opposition to any such illiberal insinuation. I know that your invention is the result of much philosophical inquiry, and promises

great good to the community, as one powerful auxiliary in the cure of disease. And I know, moreover, that it may be so used, as, in many instances, pleasantly to supersede the use of other agents, which are loathsome in their administration, and, more or less, deleterious in their effects upon the system.

Permit me to narrate the circumstances which attended a single case, which I treated upon your principles. It was an instance of a most painful dismenorrhagia, protracted to the length of five days, with frequent faintings, and continued watchfulness. On the fifth day she became perfectly delirious, with a pulse beating 120 in the minute, and her extremities cold. At this stage I was called in. I immediately exhibited an anodyne, which was rejected. An attempt was then made to compose her stomach with cordials, intended to be preparatory for the trial of another opiate. The attempt proved abortive. By this time three hours had passed away in painful anxiety, every moment hoping to see the stomach prepared to receive such agents as appeared to be necessary. Under these circumstances, I most willingly availed myself of the genial heat of your bath: first applying it to her lower extremities; and so soon as her feet were well warmed, removing it to her stomach, where its powers were concentrated, until a general but moderate diaphoresis was induced. Before the operation was ended, the delirium went off, and the patient dropped into a pleasant sleep, and rested composedly for the space of two hours.

An opiate was then exhibited, which was retained by the stomach. Medicines, such as are ordinarily used in these cases, were afterwards advised, and the bath was repeated the following evening. In ten minutes after the repetition of the bath the patient broke out uncommonly thick with the measles.

I was informed that she had been exposed to the cold for 12 hours, about the time she expected to be in delicate health, and the immediate effect was such as I have described. Till convinced by the fact, her friends were fully of opinion that she had the measles years ago. It is worthy of notice, that so completely was the surface abandoned by the excitement, so completely was the excitement locked up in the system, that she had none of the ordinary appearances which usher in the measles. Neither high fever, cough, nor sore throat attended her case. There was indeed, an alarming deficiency of animal heat;—and I am confident without the influence of artificial heat, to that extent, and with that decision which your bath only could have furnished, this patient would have died, and no

one would have suspected the true nature of the disease, by which her dissolution would have been effected.

I am yours, respectfully,

GUSTAVUS A. ROSE.

P. S. It is a certain fact, that the sleep was induced exclusively by the bath. The first anodyne dose was given in form of a pill, which was seen when it was thrown up.

G. A. ROSE.

Doctor S. K. Jennings.

Ten Honorable Gentlemen, members of the Senate and House of Representatives of the United States, thought proper to associate in the following certificate, which was forwarded by mail. And what renders it the more important, several of them are medical men by profession..

“We the subscribers, having witnessed the application of Doctor Jennings’s Patent Steam Bath, consider it a very valuable remedy in numerous diseases.

*Joseph Anderson, William Strong, Aylett Hawes,
Thomas Gholson, William Anderson, Geo. M. Bibb,
O. C. Comstock, Thomas Telfair, Richard Brent,
William Latimore.*

Philadelphia, August 10th, 1814.

DEAR SIR,

On Sunday evening last, I was called to visit a lady at the corner of Market and 11th streets, who on Friday evening previous had been violently attacked with Asthma, and when I saw her, was still laboring under much difficulty of breathing, with her face flushed, and great pain in the head, and right side. I immediately applied your Patent Steam Bath, and in about 20 minutes produced a very free perspiration with an immediate mitigation of all the distressing symptoms. After this application, I gave a tea spoonful of Elix’r Purgative and no other medicine; expecting however, that she might possibly require some bleeding in the morning. Indeed I would then have bled, but wished to give the bath the fullest trial, to see what its effects would be, without other aid. I saw this lady at 9 o’clock the next morning, and was much pleased to find her entirely relieved, insomuch, that I thought any thing further unnecessary, except a little of the brown mixture as an expectorant. The lady remarked with surprise that the pain in the side had also left her,

which in every previous attack, had uniformly remained some days after all the other symptoms had completely subsided.

Yours with esteem, &c.

THOMAS SARGENT.

Doctor S. K. Jennings.

Lynchburg, July 17th, 1815.

DEAR SIR,

Every day gives me fresh proofs of the value of the "Patent Portable Hot and Warm Bath." In two violent cases of spasmodic croup, I effected a cure with it in twenty minutes.—Calomel was exhibited after the spasm was overcome.

Mr. S. Bernard, after working steadily during a warm day, was seized at night with severe spasm; his face was quite distorted when I got to him, and he had lost the use of his superior and inferior extremities; the muscles concerned in respiration, were so far deprived of power, that he breathed with difficulty, and those of the tongue so severely paralyzed, that he could scarcely make himself understood. The Bath was applied and it relieved him in a few minutes. He took a cathartic that evening, and was quite well the next day, except the soreness which was consequent upon the violent contraction of the muscles.

I have applied the Bath in the late Epidemic, (*Peripneumonia Typhoides*;) in most cases, respiration was immediately relieved by it. Where suffocation was threatened from a swelling of the throat, the Bath was of great benefit. It was associated however with bleeding, blistering and cathartics. By warming the surface the determination was changed and in all slighter affections, the engorgement of the lungs readily overcome; but in the more violent cases it was necessary to keep the bath in operation, until inflammatory action was induced, after which the lancet could be used with safety, and the lungs more effectually relieved. Where the excitement had been equalized by the use of the Bath, the balance was maintained by blistering with a peculiar facility, and in many cases blisters were not necessary. In all these cases the Bath was used as an auxiliary together with other medicines. Among others I also was seized with this disease last fall, and in the course of an hour respiration became so difficult, that I began to apprehend very serious consequences; my pulse was small, feeble, and frequent, and my veins sunk. I went to bed, but could lie only on my back; the Bath with two cups was put in operation at my feet, and kept there for nearly an hour. By this time my pulse be-

came full and bold, I breathed with comparative ease, and could lie on either side. The Bath was now changed, and the steam directed to the affected side, for 30 minutes, when my pulse became tense; I then drew 10 or 12 ounces of blood and after remaining an hour longer in bed, rose, put on dry linen, and went about my ordinary business, suffering not the least inconvenience, except from a slight stitch in my side.

The Bath has been used by me in some cases of puerperal fever. I find that stimulants may be administered with greater safety when it is applied; and in some other forms of disease there appears to be less hazard in the exhibition of opiates, as they are rendered more diffusible by the Bath, and consequently less disposed to seek an improper determination.

Wishing that the powers of this useful invention may be more generally known,

I remain your obd't.

WILLIAM OWENS.

Doctor S. K. Jennings.

Philadelphia, August 8, 1815.

DEAR SIR,

A very respectable lady of the Society of Friends, pronounced by her Physician in Jersey, to be in the last stage of pulmonary consumption, came here to place herself under the care of Dr. Wistar. But hearing of me, and of *your Bath*, placed herself under my care; I fully expected she would not survive one month; such were her symptoms and appearance, especially, when she informed me, that she had lost three sisters and two brothers in that disease. Notwithstanding all these discouraging circumstances, I commenced, and by day gave her the muriatic acid as you advised, and by night Jennings's Warm and Hot Bath; and by the blessing of God, in six weeks sent her home, not barely recovering, but quite well.

The lady to whom I gave the Bath in August 10th while you were here, in an attack of asthma, has had no return of it since. — This I think very singular, as she had been subject to returns of the complaint every three and four weeks, for six or seven years past; she has also recovered her flesh and general health, to all appearance. I lately made the application to a Mr. Davies in market street, who for more than a year past, has had violent spasmodic affections of the kidneys. In a few hours after the application, he discharged a small stone, about the size

of a pea, which from appearance must have been formed in the pelvis of one of the kidneys.

Yours in love, &c.

THOMAS SARGENT.

Doctor S. K. Jennings.

Stephensburg, July 24th, 1815.

DEAR SIR,

For some time I have been testing the medical principles upon which you have established your Portable Hot and Warm Bath. Your invention makes the application of heat both neat and convenient. And after numerous applications of the same, in a multitude of cases, I give it my warmest approbation.

Whether we consider your principles scientifically, or your means of applying heat mechanically, there needs only a fair trial to gain the approbation of every candid investigator.

Wishing you success in the wide diffusion of your benevolent invention, (for such must be every means of lessening the quantum of human misery) and with the assurance of a hearty concurrence, I remain with every sentiment of respect,

Yours, &c.

J. B. TILDEN.

Doctor S. K. Jennings.

The subscriber is disposed to aid Dr. Jennings, in extending the use of his Potent Portable Apparatus, for administering the Warm and Hot Bath.

By this simple but admirable invention, every physician, and indeed every family may be furnished with an elegant and delightful method of applying heat. It is not attended with the difficulty and delay inseparable from any of the ordinary methods heretofore discovered: It may be put in operation in five minutes, and applied to a patient in the most helpless condition, seated in a chair, or lying on a couch, sofa, cot, or bed: it is used without water: the heat being conveyed in the vapour of burning spirit, produced and transmitted by means of a tubular tin stove: The degree and duration of the heat can be regulated with the greatest facility, and applied to a limb, or to the whole body, with equal convenience. The apparatus exclusive of a light wooden frame for supporting the bed-clothes, does not weigh more than $1\frac{3}{4}$ pounds, and when packed up, may be commodiously carried in a pair of saddle-bags or in a large pocket.

Physicians of the first eminence have bestowed the highest commendation upon this valuable improvement in the application of heat, and many patients have already borne witness to its salutary powers. Its utility, however, will be sufficiently obvious to every one who knows how much the *skin* is concerned in the preservation of health, and the production of disease; and how frequently the latter depends upon a general deficiency of healthy excitement, or upon the loss of its balance and an undue determination upon some internal part of the system.

Each apparatus is accompanied with ample *Directions for using the Bath* in every case, by which intelligent persons will often be enabled to apply it with advantage, without the advice of a physician. It will, therefore, be sufficient here to say that in certain states of every form of disease, the judicious employment of this excellent invention will be found to be a powerful, safe, and pleasant remedy. In those violent affections of the *throat, head, and breast*, which have prevailed in different parts of the country, it has been used by Dr. Jennings, and others, with the happiest results.

It may not be superfluous to add, that Doctor Jennings is a gentleman of the most respectable standing in society, and of high reputation as a physician; and that in his efforts to diffuse this fruit of his labors among mankind, he is actuated much more by feelings of benevolence than by any desire of pecuniary emolument or professional fame.

S. B. FOSTER, *Physician,*
Shepherd's Town

Dr. S. K. Jennings.

Philadelphia, 8th mo. (August,) 20th, 1814.

In our attendance in the Alms House of this City, we have had several opportunities of witnessing the use, under the direction of Dr. Jennings, of the Warm Bath patented by him. It appears to us an economical and expeditious mode of applying heat, and, in the instances which fell under our notice was uniformly followed by a plentiful diaphoresis.

JOS. PARRISH.
THOS. T. HEWSON.

This day, the 5th June, 1816, at the request of His Excellency Governor Claiborne, the Members of the Medical Board, of the State of Louisiana assembled at his house, for the purpose of examining a new Portable Steam Bath, invented by Dr.

S. K. Jennings, for which he has had a patent granted him by the government of the United States.

After examining the apparatus and trying its effects, the Members of the Medical Board are of opinion,

1st, That this Portable Steam Bath, is as simple as is desirable.

2nd. That it's action upon the body submitted to it, is almost immediate : but may nevertheless be graduated, according to the degree of perspiration necessary to be produced.

3rd, That it has the advantage of being portable, and may be employed without removing the patient from his bed.

4th, That it will be very useful in cases of suppressed perspiration, Chronic Rheumatism, and all diseases which require a prompt diffusion of vital warmth throughout the whole frame.

5th, That the small cost of this apparatus renders it a desirable acquisition for every family, since no other can be substituted for it.

The Board takes this opportunity to invite gentlemen of the faculty, to try its powers in curing tetanic affections—to collect the result which they may obtain in employing it in a disease as formidable as common to this country ; and to make those results known to the Board.

(Signed)

F. TRABUC, *President.*

O. H. SPENCER,

GROS,

J. H. CONARD,

GRANDCHAMPS.

When it is considered, that these many respectable Physicians, some of them the most eminent of the profession, with one consent bear an honorable testimony to the value of my Patent Bath, surely many more of the faculty will see the propriety of uniting with them. Indeed I cannot permit myself to suspect that any individual will undertake to contradict the joint evidence of Doctors Tilton, Mitchell, Gallup, Cabell, Rose, Hawes, Comstock, Bibb, Latimore, Sargent, Owens, Tilden, Foster, Parrish, Hewson, and the Medical Board at New-Orleans. Especially when it is considered, that their statements are supported by the President of the United States, Mr. Jefferson, the Secretary of War, and Doctor Thacher, as also by the most distinct testimony of ten Honorable Gentlemen, associated voluntarily for that express purpose.

Mr. Jefferson, however, wisely suggests the possibility that the Patent Steam Bath, like other powerful remedies may require time and experience, before the proper discriminations can

be made between those cases in which it may be useful and the contrary.

What says Doctor Mitchell after having had much experience in the use of it? "*It is so handy, and so within the reach of any body, &c. that its power to be beneficial is exceedingly enlarged.*"

What says Doctor Foster? *that intelligent persons may often be enabled to apply it with advantage, without the advice of a Physician.*"

The candor and disinterested goodness of these two gentlemen, will be more fully evinced by the following testimony of respectable citizens, who are not medical men by profession.—That the weight of each may be properly felt, I shall precede each letter or certificate, with a short remark upon the character of its author.

The Rev. Mr. Reid, is a learned and excellent minister of the Presbyterian Church (Lynchburg.)

Lynchburg, September 26th, 1815.

DEAR SIR,

I have had your Patent Steam Bath in use in my family about two years, have applied it in a variety of cases, and have always perceived the happiest effects to follow. In a word, I consider it a most efficient agent in arresting in their incipient state, all diseases originating in cold: and that a judicious person, by its aid, may generally manage all common cases of sickness in his family, without medical assistance.

Yours very respectfully,

WM. S. REID.

Dr. S. K. Jennings.

The following letter is from General Preston, treasurer of Virginia.

Richmond, March 26, 1814.

DEAR SIR,

I should be wanting in justice to you, not to inform you what effect the application of your Portable Warm and Hot Bath had upon me, in a paroxysm of the rheumatic gout. The attack was in my ankle and heels of both feet, and the great toe of the right. During three days, the pain increased, and with such violence, that I was in the most extreme agony.—In the height of this extremity, my brother, colonel Francis Preston, came in to see me and proposed, rather jocosely, that your apparatus, which was just then beginning to be spoken of in the city, should be introduced to try its effect.—As every other of the

usual applications, such as fomentations, rubefacients, camphire, &c. had failed, I consented, though without any high expectation, or much confidence, but like other persons in great pain, was willing to try almost any thing which is prescribed for relief. It was accordingly introduced and applied, and in about forty minutes, before one cup of the burning ardent spirit was consumed, it procured a complete remission of the pain—I fell into a sound sleep which continued nearly seven hours; and when I awoke, was so far restored that I felt an inclination, and thought I had the ability to ride in a carriage for exercise, which I would have attempted, if the weather had been favorable. On every return of the spasms, which after the first application of the bath grew weaker, I used it as seemed agreeable: and, with one exception, which I now attribute to an injudicious application, it never failed to produce relief. Its utility in such complaints, indeed in all inflammatory diseases strikes me most forcibly. I have no doubt that my cook was rescued from a severe fit of pleurisy, to which she is subject, by a timely and judicious application of your Hot and Warm Bath. She was completely restored to her usual health in two days.

With sentiments of high regard,

I am, dear sir, your obedient servant,

J. PRESTON.

Doctor S. K. Jennings.

Colonel John Ambler is well known as one of the most respectable citizens of Richmond.

Richmond, March 14, 1814.

DEAR SIR,

For some weeks past, I have made use of your Steam Bath, in cases of cold and fever, where there have been evident marks of violent inflammation, attended with great pain. In each of these instances the patient has been relieved within a few hours.

I have also used it in a cutaneous complaint of long standing; although the disorder is not removed, still the general health of the person has been evidently improved from the use of the Bath.

I am, respectfully,

Your friend and most obedient servant,

J. AMBLER.

Doctor S. K. Jennings.

Mr. Norris is a respectable merchant, residing at Fauquier Court House.

Fauquier Court House, August 2nd, 1815.

DEAR SIR,

If you could have furnished me with the Bath and Explanatory Pamphlets, in my opinion I could have disposed of from 50 to 100 since last fall. I have made use of it constantly in my family for ten months, in the commencement of all colds, and in almost every instance have found it very beneficial indeed. Most diseases seem to be produced by colds, and on immediate application it checks the disorder in an agreeable and pleasant manner.

I am myself very subject to taking cold and have applied it constantly, and derived great benefit. I am the more pleased with it on account of the pleasant sensation it produces, contrary to the expectation of a person never having experienced it.

I have found it produce wonders in my own family in the rheumatism, and in the bilious fever; and in the cholic among some of my neighbors—where they could get relief no other way. Some seemed to be in such an agony, as if they must die, and when the Bath was applied, and a profuse perspiration was produced, they were immediately relieved.

I attended a neighbor not long since, who was suddenly taken with a violent pain across his breast and shoulders, so that he could not turn in his bed. I applied the Bath locally, extending and continuing the heat until he was very warm and wet.—He was relieved. In fact, in a few hours was out of bed and in health. Really such is my opinion of this invention that I would not take \$500 for the Bath could I not get another.—Some weeks past I had a violent cold, was so hoarse and had such a cough, that I could scarcely talk. I dreaded the application of the heat on account of the very warm weather; not having tried it in the summer till then. But to my surprise it was agreeable, and the hoarseness was removed immediately.—The cold broke, I discharged the gathering mucus and was shortly relieved. It certainly would be a great benefit to the world, was its value known and it was brought into general use.

I am with great respect,
Your obedient servant,

THAD'S. NORRIS.

Mr. Grigsby who follows next in order, is a respectable citizen of Prince William County, Virginia.

August 2nd, 1815.

DEAR SIR,

In justice to you and to the community at large, I cannot longer be silent upon the good effects which I have witnessed from the use of your Patent Steam Bath.

In June, 1814, I was taken ill with a dysentery, while in the city of Richmond. My friends thought I would do well to recover in four weeks. The Bath was twice used and I was cured without other remedy. I immediately purchased one for myself. Shortly after a Miss Cowles of my neighborhood, was taken sick at my house. A bilious cholic. So extremely ill that she was unable to undress herself. I treated her with the Bath till a free perspiration was produced. It gave her entire ease. She slept well that night—ate heartily the next day at every meal, and was quite well. She was habitually subject to attacks of the same kind, which in every former instance had required much medical attention. It has been more than twelve months since she was cured by a single application of the Bath, and there has been no return of her complaint. She now constantly asserts that she would rather have the Bath, than the best physician in the world without it.

My wife's sister was afterwards taken with a violent bilious fever. She was cured at once, and says she would not take any consideration for the Bath if another could not be had.

Mrs. Crisman a poor woman in my neighbourhood, had been confined to her house from September until June. I gave her three applications of the Steam Bath, and the next day she walked to see one of her neighbors and has not been confined since.

I visited a friend in Frederick county. In the neighbourhood there was a certain Miss Mitchell, extremely ill with a bilious. I had carried my Bath with me. I went to see her, and requested the privilege of trying it in her case. She recovered immediately—believes confidently, I saved her life, and expresses much gratitude.

Two other ladies were ill with violent cholic, both of whom were immediately relieved upon the application of the Bath.—I myself was the first in this neighborhood who took the late Epidemic. I had a terrible pain in my head, with a wonderful disposition to sleep, and my throat was very sore. I was taken about four miles from home. At my request Mr. Foote sent for a Bath. I had it applied that night, and the night following.—The next day I got home. My friends were alarmed and privately advised my wife to send for a physician. But I forbid her. At length she told me that a certain gentleman, a man of good information, had given her his opinion, that I should certainly die, and that the credit of the Patent Steam Bath would be gone forever, as it would be said that it had killed me. I told her that she could contradict that statement, inasmuch as she knew I always was better after the application. I used it night and morning to my feet, and when my throat would be so

sore and stiff, that I could not swallow I applied it to my neck, so as to sweat my head and neck, which was a great advantage to me. I recovered in a few days and took not one particle of medicine. Afterwards my family was seized with the same complaint. Ten of them down at once. I bathed them and proceeded in other respects, as your pamphlet directs—and although many were sick, thro' mercy they all recovered, and I had no physician.

On the 1st July last, my house servant was seized with a flux. He discharged great quantites of blood; for more than a week before I was made acquainted with his condition—Two bathings effectually cured him.

I cannot enumerate all of the many cases which I have already relieved with the Patent Steam Bath. I do not believe that even you yourself, can sufficiently appreciate the great good that must one day result from this invaluable remedy. It will bring lasting blessings on the human family, and I believe no man can say too much in its praise, only let it be fairly tried.

From your friend,

A. GRIGSBY.

P. S. Mrs. Crisman, was so drawn up and decrepid with Rheumatism, that she could not straighten herself until after I had given her the Bath.

Paul Carrington, Esq. deceased, was one of the Judges of the General Court of Virginia.

Sylvan Hill, August 24th, 1815.

DEAR SIR,

Mr. Ramsay is desirous of appointing an agent in Charlotte to dispose of some of Doctor Jennings's Patent Machines for the Steam Bath.

I have no doubt, but that the invention may be extensively useful. If confined to the cure of rheumatism, in which I know it to be beneficial, it affords a cheap relief. The machine which I have, was loaned to Mr. Isaac Coles for some months, who assured me, he found it very beneficial in rheumatism, croup, and in its application to chills preceding fevers.

Accept of my esteem,

PAUL CARRINGTON, Jr.

Mr. Eppes is a respectable citizen of Lynchburg.

September 26th, 1815.

DEAR SIR,

Having used your Patent Portable Warm and Hot Bath, in my family more than two years, I feel it my duty to bear testimony of its worth. My wife at one time was seized with a

violent fever, which increased rapidly, so as to excite alarm.—Her pulse in the space of 3 or 4 hours from the commencement beat 133 strokes to the minute; I gave her the Bath, which so completely broke her fever in the course of the night, that she was almost well the next morning; some slight feverish symptoms only remained, which wore off without any other aid. In two instances a niece of ours was very ill. The first, a high fever, attended with a sore throat and soreness at the stomach, with great stupor. The other a case of measles. In each a single application of the Bath afforded entire relief. In the last there remained the breaking out of the measles only, without any pain. Seven or eight others of my family were sick all nearly at one time. The symptoms were, first a chill, then a high fever, sore throat, soreness at the stomach, great stupor or sleepiness. From two or three applications of the Bath made at intervals in each case, with the aid of a gentle cathartic, restored the patients on foot in the space of three to five days; except a single instance only, in which the patient's throat was so inflamed as to compel us to prop her up in bed, in order to save her from strangling. In this case immediately after the third Bath, blood letting and a blister plaister were added; after which the patient fell asleep, had a good nights rest, and in a few days was restored to health.

Many other cases, such as pleurisy, rheumatism, dyssentery, tooth ache, and great colds; have been entirely relieved by the use of the Bath most commonly without any other aid. Hoping that all who try the Bath may be attended with like success, I subscribe myself your humble servant,

HAMLIN EPPES.

Dr. S. K. Jennings.

The following five gentlemen, are all citizens of Lynchburg.—Mr. Martin and Mr. Carson, are preachers of the Methodist Episcopal Church.

Lynchburg, January 1, 1815.

DEAR SIR,

I should consider myself wanting in gratitude, if I did not communicate the happy effects resulting from an application of your Portable Bath. My little daughter was suddenly seized in the night with a fit of the croup, which threatened immediate suffocation. I had recourse to the ordinary mode of bathing, which afforded but temporary relief. She continued with a high fever all the next day, with threatening symptoms of relapse.—In the evening I applied your Bath with such success, that in a lit-

the more than one hour she was entirely relieved, both of fever and all symptoms of spasm.

S, SCHOOLFIELD,

Doctor S. K. Jennings.

January 7, 1814.

SIR,

Encouraged by the successful use you made of your Steam Bath, in the case of my wife, when ill of the child-bed fever, I have since tried it upon a negro boy, who was taken with a violent cold, attended with pains, so that he could scarcely move his legs. I repeated the Bath several times. From the first application he began to mend, and he recovered in a very few days, so as to be able to walk about.

Respectfully, I remain yours,

CHRISTOPHER WINFREE,

Dr. S. K. Jennings.

January 7, 1814.

DEAR SIR,

I feel it my duty to inform you, that my wife who had been for many years much indisposed, subject to frequent attacks of violent colds, and when at her best, suffering almost daily attacks of chills and fevers, has tried your Patent, Portable Bath with the most happy effects. Upon three applications she was restored to health. It may be proper for me to state, that she is 63 years of age. I am yours sincerely,

WM. P. MARTIN.

Dr. S. K. Jennings.

January 30, 1814.

DEAR SIR,

My little son was extremely ill of a bowel complaint. Ordinary medicines were tried in vain; and I had nearly despaired of his life.—The Bath was recommended and tried—its effect was so decisive, that bye-standers could perceive the immediate amendment, and the child recovered, having received a single application. I am yours, &c.

ARMISTEAD TRUSLOW.

Dr. S. K. Jennings.

September 20th, 1815.

DEAR SIR,

I have for a considerable length of time been in possession of your Patent Steam Bath, and have had occasion for the frequent use of it; my family having been much afflicted. I must confess to you sir, that I am highly pleased with it, and I think it a great improvement in the healing art. I have never known it fail to have good effect in any instance in which I have applied it. As an instance, I would state that my wife for many years was subject to a violent head ache. I thought proper to use the Bath by way of experiment. It produced immediate relief. I have had it applied to myself, and must say it is the most pleasant remedy that I ever used.

Yours, &c.

JOSEPH CARSON.

Dr. S. K. Jennings.

Mr. Green, Mr. Seaman, Mr. Brough, and Mr. Shuster, reside in the Borough of Norfolk. I can say nothing in confirmation of the respectability of these men, which will be contradicted. The concurrence of their testimony will be deemed absolutely conclusive, by the Citizens of this Borough, and by all who know their standing in society.

Norfolk, October 15th, 1816.

DEAR SIR,

I was persuaded, that your Patent Steam Bath would be of great service to me, the first time I saw an account of it. For I had always been very subject to take bad colds, and in my younger days, could get certain relief by taking a good sweat in the common way; but after advancing in years, it had been with great difficulty I could be brought to perspire, and sometimes it could not be effected at all. As soon as an opportunity offered therefore, I procured one.

I have now been making use of it for myself and family, which is 15 to 20 in number, for nearly three years, and my expectations have been far exceeded.

From time to time, we have applied it in a variety of cases, and never once, without some good effect. In ague and fever, when the cases have been recent, they have been cured by the first application. In three cases of the cramp choleric, and one of them uncommonly violent; in each, in about thirty minutes the patient was in a sound sleep, and within a few hours entirely well.

I think it a duty I owe to you, as well as to the public, to state two particular instances, which have happened to myself.—

Some time last fall, I was much disordered in my bowels, for nearly a week; occasioned I suppose, by a bad cold. It seemed as if it was so ordered by Providence, that the full effect of the Bath might be tried. I had gone on neglecting myself from day to day, until I could scarcely attend to my business. I suffered extremely from a constant tenesmus. The gripings were very frequent, and the discharge little else than blood and slime. In this condition I went to bed, took a Bath for about thirty minutes, which kept me in a profuse sweat all night. —The next morning I had as copious an evacuation as I could have wished, and felt entirely clear of the complaint, without taking one particle of medicine. The other instance happened about six weeks since. I was suddenly seized with a violent pain in my back and hip, so that I could not turn myself in the bed, any more than if my back had been broken. I applied the Bath, in six hours I could sit up, and in a day or two, was entirely well. Mrs. Green has applied it in a number of cases, to her poor neighbors, and scarcely ever without success. She has treated such cases as ague and fever, sore throat, rheumatism, disordered bowels, and even the tooth-ache.

In short, I think I can safely say, we have not only been saved from much sickness, but also from much expence. In the space of three years, we have not called in a doctor more than three times. I have only now and then to get a dose of physic from the apothecary, and that with the Bath answers every purpose. I must furthermore add, that I never have received the smallest injury, though I have frequently got up before sun-rise and gone about my business as usual, after sweating profusely all night. I am with great respect, yours, &c.

RICHARD L. GREEN.

Dr. S. K. Jennings.

Norfolk, 10th October, 1816.

RESPECTED FRIEND,

I have used the Patent Portable Steam Bath in my family for nearly three years, and am prepared to say, that its usefulness has far exceeded my most sanguine expectations; I feel it a duty to mention some among the many instances, in which it has been proved.

Two grown persons attacked with the cramp cholic, apparently in the most excruciating pain, were perfectly relieved in a short time, and in both instances, were in a sound sleep in less than thirty minutes, and no return of the complaint since.

In several cases of the epidemic, that prevailed in the winter and spring of 1814 and 15, I also used the Bath. It was found equally beneficial, and I can add, that its usefulness in a private family was made more conspicuous, from the circumstance of some of the above instances happening in the night, when it was difficult to get a physician, and I have never hesitated to make use of it without medical advice.

I have myself for many years been afflicted with a complaint in the head and stomach; and could find no relief but by blood-letting, and that only temporary. I have lately tried the Steam Bath, and have every reason to hope, that I shall be able to lay aside my former painful remedy.

THOMAS SEAMAN.

Dr. S. K. Jennings.

Norfolk, October 12th, 1816.

DEAR SIR,

If a certificate from me, respecting the efficacy and convenience of the Patent Portable Bath, can be of any use to the public, you are welcome to the following facts.

I have been using your method and apparatus in a family way, upwards of two years and a half. My family is large. I make no pretension to medical skill, and Mrs. Brough more frequently applies it, than any one else. Still however, after repeated trials, I am prepared to say, that our success has been fully equal to any thing which you had promised us in the pamphlet upon the subject. In a number of instances, we have waited upon our friends and neighbors, and with the same uniform success.

Mrs. Brough has been afflicted with a gouty or rheumatic complaint, for ten or twelve years past, and was generally confined during the whole of the winter. The last winter she used the Patent Steam Bath upon herself, every night, for three or four months; and two or three times a week for the remainder of the time, reckoning from the first of the year. She went abroad the most of the winter, and her general health is now very much improved.

We have used it in the commencement of several cases of small-pox, in the measles in a number of instances; in agues and fevers, cholics, and in all sorts of complaints, such as in a family way, we ascribe to the taking of cold very often. In all these instances, we managed the business as well as we could, agreeably to the instructions which you have given in the pamphlet; and we never failed of meeting with a degree of success even beyond our expectations.

I candidly think, this remedy ought to have a place in every family. At least for myself, I would not be deprived of it now I know its worth, for ten times, no not for fifty times its cost.

I am, with much respect and esteem,

ROBERT BROUGH.

Dr. S. K. Jennings.

Norfolk, October 19, 1816.

DEAR SIR,

Having used your Steam Bath for nearly three years, with great success in my family, I feel myself bound to give you a detail of some of the good effects we have experienced therefrom.

There is residing with me, an old lady, who was troubled with severe pains every winter, for several years. She was perfectly restored by one application, and there has been no return of the complaint, although it has been eighteen months since she was cured.

I have proved the good effects of the Bath in several cases of cholic, both upon myself and family. I have known it to procure perfect ease in twenty minutes, in the most severe cases.—It is common for the patient to fall asleep, whilst under the operation.

A gentleman came from the country to my house, who had had the ague and fever for several weeks. He stated, that he tried every thing the physicians had recommended, and found no relief. By a few applications of the Bath, he was perfectly restored to health.

In all cases of bad colds, it is a most effectual remedy, and if it were for this only, I would recommend it to all families, as a most valuable family article.

I am pleased with it the more, because we can manage all common cases, without the advice or attention of a physician.—Indeed I must say, that if it is used as you direct, there will not be much need for physicians or medicine.

Perhaps it might not be amiss for me to add, that the Rev. Mr. Waters of Princess Anne, informed me, that in the way of charity, he attended a great number of persons last winter, sick with the late fatal epidemic; and that in every case where the Bath was applied, the patient recovered.

Yours respectfully,

JACOB SHUSTER.

Dr. S. K. Jennings.

After this host of consistent testimony, the reader will permit me to state, that my practice for several years, has been one continued display of similar facts. I do not say, that all cases are cured with equal facility and decision. But as often as I have been called to persons recently sick ; after making the proper allowances for different ages, degrees of strength, accommodation, &c. the good effects of the Bath, have been more uniformly evinced, than of any, or all other remedies collectively, that I have ever tried or witnessed.

And I must add, that my experiments have been repeated so frequently, that I am compelled to believe the skin to be chiefly concerned in the formation of disease.

That this conviction is the result of candid induction, and is supported, by an appeal to the laws of animal life, will be made distinctly to appear by the following explanations.

EXPLANATIONS OF THE NATURE OF THE REMEDY, &c.

THE bodily health of man, depends upon the regular production, and uniform co-operation of four powers, essential to life, each of which I shall consider distinctly, under the following terms; *Excitability*, *Excitement*, *Stimuli*, and *Vital-Heat*.

1st. *Excitability*, which has also been called vital power, and sensorial power, would be as well understood perhaps, if I were to say, it is the principle of life.

Under the influence of this power, the several parts and organs of the system, are made capable of receiving active impressions.

The eye for instance, which from its construction, is itself a most perfect perspective, or telescope, would nevertheless be altogether useless, did not the excitability make it capable of feeling the impression, made upon it by the rays of light.

The ear, by the excitability with which it is charged, feels the impression made upon it by sound.

The membrane which lines the nose also, by this same power, is capable of feeling the impression made by odors. In the same manner, the tongue is made capable of perceiving tastes.

The skin, is likewise prepared to feel the impression, made by external agents or substances; as of heat or cold, or by the touch of any thing soft or solid, rough or smooth.

But the impressions made on the organs of sense, are not immediately connected with that co-operation of powers, upon which life depends. Each of the senses, when awakened by any suitable impression, furnishes an instance of perception; and in this way, may have more or less influence upon the state of health. There is another exhibition of the presence and influence of excitability, essential to the preservation of the system, which will help to an understanding of what I mean, by the term *Excitement*.

2nd. The influence of excitability upon the heart, arteries, veins, lymphatics, glands, and secretory vessels, makes these several organs, capable of feeling the impressions made by the stimulant powers which act upon them, and prepares them to perform those peculiar motions, by which they are alternately expanded and contracted, &c.

By these almost inexplicable motions, the blood and lymph are circulated; the various absorptions and secretions are carried on, and the different excrements are thrown out of the system. The organic motion, maintained for these important purposes, I shall call *Excitement*.

As impressions made on the organs of sense awaken perception, so also it would seem, that impressions made upon the blood vessels, &c. excite motion.

Pleasant impressions made on the organs of sense, are desirable, and can be a long time sustained. But too much light, acting beyond a certain limited duration upon the eye, extinguishes the power of vision; and too loud sounds, destroy the power of hearing. So also, healthful excitement is pleasant and can be sustained in many instances, three score years and ten. But if raised too high, the vessels feel pain, and life may be prematurely extinguished.

Excitement is maintained at the expence of the excitability; and therefore, there must be a constant production of excitability in the system, equal to the expenditure necessary for the maintenance of perpetual excitement.

If the excitability be produced in a degree below its natural quantity, it will make the system liable to disease. If the excitability be accumulated to a morbid degree, it will also make the system liable to disease, in another and opposite condition.

And as excitement is dependant upon the presence and co-operation of excitability with other powers, it is obvious, that every distinct variation in the state of the excitability, must also affect the excitement.

These variations, therefore, will be considered more at large, under the next division of powers.

Srd. The third order of powers, which are *Stimuli*, includes a variety of agents, such as the different aliments, heat, atmosphere, light, sounds, odors, bodily exercise, thought, &c. to which must be particularly added, the touch and motion of the blood, as it acts upon the heart, arteries and veins, as also the touch and motion of the lymph, and other fluids secreted and deposited in their various receptacles, or moving in their passage, through their appointed tubes.

These various stimuli, acting upon fibres and vessels, and organs, charged with excitability, rouse them to action; and by repeated or continued impression, urge them on in a kind of perpetual motion.

Therefore, if the excitability be regularly produced and distributed throughout every part of the system, and if the nourishment and other *Stimuli* are present in due order and proportion, the excitement will be equable and healthful.

The application of preternatural stimuli will produce more than ordinary excitement, and of course an extraordinary expenditure of excitability.

The system, if long oppressed by preternatural stimuli, will sink into a state of indirect debility—a state in which there is a deficiency of excitability. A man staggering from the use of ardent spirit, or from chewing tobacco, furnishes an instance of this kind of debility. He has been checking too heavily upon his stock in life. The same or a similar effect may be produced by a sickly atmosphere. And such is the state of things in most cases of sudden and dangerous fever—as the yellow fever, violent bilious fever of almost every grade, &c.

By the subduction of any of the natural stimuli, excitement will be diminished, and consequently, excitability accumulated.

The same effect may be produced by certain sedative agents, such as cold and fear. Whenever excitement is long reduced to a state below that which is natural, whether by the subduction of stimuli, or by the application of a sedative agent, the system rises into a state of direct debility, a state in which excitability is accumulated. This is the condition of a man recently weakened by loss of blood; by the operation of a violent cathartic, or by excessive fasting.

These inferences, however, though certainly true, admit of limited application only.

For at the same time, that preternatural stimuli produce extraordinary excitement, yet if applied in a certain gradual manner, the system will acquire a capacity to generate a preternatural portion of excitability; assuming a state analagous to that of natural excitement. This process is performed under the control of the same laws of the system by which it adapts itself to different climates, and in every climate, to its seasons, modes of living, &c. By the same laws the system is saved from immediate destruction, when men shamefully impose upon it those oppressive and poisonous stimulants, tobacco and ardent spirits.

But when the stimulant agent is powerful, and suddenly applied, or when applied a sufficient length of time, it may overwhelm the system with all its resources for adaptation, and produce a state of indirect debility.

So, also, when there is a gradual subduction of stimuli, and the excitability is accumulated in a small degree only, the system, by its own powers of re-action, may raise its excitement, and find a natural balance. The loss of a single meal, or of half a pound of blood, seldom much incommodes a man in pretty good health. But a sudden and copious, or a frequently re-

peated subduction of stimuli, or the agency of cold too long continued, may produce a pernicious degree of direct debility.

Whenever debility of either of these two descriptions prevails to a considerable extent, it places the system in a state liable to disease, and in this view, debility is well enough said to be the predisposing cause of fever.

4th. The fourth power, which is vital heat, though necessarily co-ordinate with animal life, requires a distinct consideration; because it is subject to morbid variation, and very often requires certain and distinct medical management.

Vital heat is produced and maintained in the animal system, in some way, through the functions upon which life depends: and the circulating blood, must be the medium through which it is distributed. And as there is no sensible difference between animal heat and that which is produced by common fire; therefore, the former as well as the latter, is forever escaping, seeking an equilibrium of temperature with that of the surrounding atmosphere. It follows of course, that the system may be placed in a condition, in which vital heat may not be generated with sufficient rapidity to keep up the natural degree of warmth. Hence the necessity of fire in wintry and damp weather, as also of putting on wearing apparel well calculated to prevent the escape of heat. Indeed, it is obvious to common sense, that the warmth of the surface should be fitly adapted to that of the central vessels, and that this equilibrium should be regularly maintained. Without it, a portion of the excitement will be suspended, excitability accumulated, and the system made liable to disease.

Furthermore, the system in its variable susceptibilities of impression, from external and internal heat, is capable of falacious sensations. In a summer's night for instance, after a very hot day, the heat for some hours is felt much more oppressively, after the thermometer is considerably lowered. The degree of heat cannot be less and greater at the same time. It is not the heat of the surrounding atmosphere which causes the distress. The vital heat conveyed through the circulating fluids, is painfully felt by the skin. The skin is thus morbidly sensible to the internal heat, by reason of the refrigerating effect accompanying a profuse and long continued perspiration. The atmosphere is not too hot to be comfortable, but the skin is too cold to be insensible to the internal heat of the system. The state of the thermometer and that of the skin, evince this truth. And if these two witnesses are doubtful, it shall be demonstrated to any one who will experience the pleasurable relief, which a hot-bath instantly affords when in this condition.

The above fact explains the cause of that heat and thirst which is felt upon great loss of blood, or the violent operation of a dose of medicine. Both the thirst and heat are increased by drinking cold water. The sedative effect of cold upon the fauces and esophagus, increases their sensibility to heat, and therefore the heat of the circulating blood and fluids of those parts is more painfully felt;—In other words the cold water like eating snow or ice in the winter causes the throat and gullet, painfully to feel their own vital heat. Thirst of this description is best corrected by hot and stimulant drinks: the external heat by the application of the Bath.

Again whether animal heat depend upon the developement of caloric in the lungs, or upon mechanical attrition, or whether it be the result of a chemical decomposition of the fluids, which is taking place in the glands and secretory vessels, or whether it be co-ordinate with excitement, and is a necessary result of the action of stimuli upon the fibres of the system—whether one or all of these considerations are involved in the production of vital-heat, it must equally follow that there is a deficiency of this principle, whenever there is a deficiency of excitement.

Damp or cold weather lessens the circulation of the blood in the vessels of the surface; and if the exposure be continued too long to a person in full health, it is commonly followed by an attack of *pleurisy*.

The same kind of exposure happening to a very fleshy person, and especially to one in habits of drinking ardent spirit, is commonly followed by an attack of *bilious pleurisy*.

And a person advanced in years, or a more youthful person immediately after great and long continued fatigue, is liable to an attack of *bastard pleurisy*.

In a way something like this, are produced most of the instances of rheumatism, catarrh, quinsy, croup, head-ache, tooth-ache, &c.

In all these cases, the common notion is, that the patient has taken cold. And common sense in this, as well as in most other things, is according to truth. For the fact is, that cold alone, or cold combined with some degree of fatigue, may be considered as the predisposing cause of complaint in all such instances.

We have seen, that if the excitement is raised too high the excitability may become too much exhausted, and in that way make the system liable to disease.

In sickly places and seasons, the atmosphere is loaded with poisonous agents, which, together with the daily repeated heat of the sun in midsummer, produce a state of debility. When the system is thus enfeebled, the quantity of animal heat which is dependant upon the circulation, is proportionably diminished,

and those branches of vessels most remote from the centre of motion, that is the skin, must receive a deficient supply of blood and heat.

Hence it is, that a person in this condition can so easily be injured by the chillness of a summer's night, or by damp or rainy weather, or weather unusually cold for the season. The surface being feebly supplied with circulating blood, the cold of a summer's night, is sufficient to suspend the action of the vessels, so as to destroy the balance of excitement, and prepare the system for that state of things, which is fever.

The greater the degree of exhaustion, the more morbid will be the effect of exposure to the cold; and the contrary.

If the prostration be not too much below that state of things, which would lead to an instance of inflammatory fever, the case will assume a character as nearly as may be, similar to that of a pleurisy. It will be a case of intermittent fever, and according to circumstances, will be a quotidian, tertian or quartan.

If the degree of debility be greater, the case will assume a shape more like that which is called *remittent fever*.

A still greater degree of debility will be followed by a *continued fever*.

And finally, if the exhaustion or debility be sufficiently great there will follow an instance of *typhus* or *nervous fever*.

It would seem then, that fever is in it's nature, about the same thing;—and that it's various appearances, are the result of different degrees of strength only, which may be present in any case under it's influence.

It is obvious therefore, that in all these diversities of predisposition to disease, a due regard to the temperature of the surface, would effectually prevent an accession of fever. The patient thus enfeebled by the remote cause, would be sensible of weakness. But upon maintaining a balance of the four powers of life, he need not experience any thing more distressing, than that which attends the most favorable convalescence.

If this explanation of the powers of life may be credited, then we may safely infer from the whole, that in correcting disease, art may be confined to four principle intentions.

The first intention should be to secure a competent supply of heat, and maintain a proper equilibrium of temperature.

The second, to put down or diminish excessive excitement.

The third, to extinguish any excess of excitability.

The fourth, to support the system in any case of debility.

Any other that might be added, must be the result of a combination or modification of these, in any manner necessary or proper for the correction of local disease.

Although the simple doctrines here exhibited are not generally admitted, the practice of most skillful physicians, might be quoted for the confirmation of all that is here advanced.

It is a fact well known to all thinking men of observation, that notwithstanding the diversity of theory, medical men have imperceptibly run into an uniformity of practice. Hence we find, that blood-letting, puking, purging, blisters and salivating, for many years have been the general remedies which they have employed for the cure of fever in all its diversities, although they have called it by a very great variety of names. And if disease is indeed a unit in its nature, as was so ably and conclusively taught by the great Doctor Rush, it is perfectly philosophic to admit the existence of remedies of general application; and of great general principles and agents which may be so modified as to be generally appropriate. And therefore, so far am I from condemning this uniformity of practice, that I applaud and consider it good evidence of the soundness of the practical judgment of those who pursue it.

If then, the general practice of physicians declares, that blood-letting, puking, purging, blistering and salivating with mercury, are general remedies, I may be permitted to add the Patent Bath as another general agent; especially if it is made evident, that this, more than any other, admits of general application.

The first intention which I propose, viz: "*to secure a competent supply of heat, and maintain a proper equilibrium,*" &c. is most readily answered by the use of the Patent Bath. This method, warms and softens the vessels of the skin, raises the excitement of its blood-vessels and secretory organs, induces a degree and continuance of perspiration, inimitable by any other arrangement.

2nd. Excessive or violent excitement, is lessened, first, directly by blood-letting, which at once strips the system of its most vital fluid. It may also be done indirectly by the means of a very hot bath. By this method the excitability of the system is safely expended by increasing the excitement of the vessels of the surface. The same intention may be answered in a mixed way, by purges, pukes, sweating and blisters, if the blisters are sufficiently large.

3rd. Excitability may be diminished, if not directly, yet very nearly so, by a very hot bath, and by extensive blistering.

It may also be effected in a mixed way, by small, frequently repeated blood-lettings. But a much more effectual indirect method is to use cathartics, pukes, nauseating doses of antimony; or say tartar emetic, or ipecacuana or seneka, &c.

4th. In any case of debility, the system is supported, first,

directly by nourishment and cordials. And also indirectly by tonic bitters, small blisters, friction on the surface, and gentle exercise; as also by a discreet use of the hot or cold bath.

A morbid determination of excitement or a local disease, is corrected by general remedies, as blood-letting or puking, purging, &c. &c. where the general state of the system requires such general course. Or it may be treated by local remedies, as by bathing the part affected, or by blisters, liniments, &c. &c.

DIRECTIONS FOR USING THE STEAM BATH.

In any case of sudden emergence, the Bath may be administered by supporting the bed-clothes with a staff or board of suitable length, or with any sort of a temporary frame, taking care to use a few sheets of paper, to defend the bed from being scorched; and to adjust the whole affair so as to secure a free diffusion of the heat over the body of the patient.

There should be provided in every family where the Bath is used, a suitable frame,* for the purpose. It might be something like the following description:—Half a circle or a half-hoop of good strength, and twenty-two inches in diameter, will form the end which is to stride across the body of the patient a little below the breast. A half circular plank, eighteen inches in diameter, will make the foot end of the frame. A thin board four feet long should cover the top, and a lath or two of similar length, should secure each of its sides. A hole of suitable size, should be made in the middle of the foot end, for the introduction of the tube.†

The patient should be stripped of all his clothing, except his linen, which after the Bath goes into operation, he may draw up to his chin. The frame is to be laid over him in bed, and a sufficient weight of bed-clothes should be used so as to confine the heat properly.—A sheet, and four or more blankets, or other covering to that amount, for the winter season; a blanket less will serve for the summer. The Bath is applied at the feet, which is most proper in all ordinary cases, and the heat has a free opportunity to diffuse itself all round the body of the patient, which is always important. The weight of the bed-clothes being properly sustained by the frame, he can turn him-

** This frame is highly important, and in many cases indispensable. In pleurisies and other violent cases, the heat ought to act at once with considerable violence upon the whole surface.—Indeed, the frame ought always to be used when it is intended to produce a general perspiration.*

† See the figure of the frame on the plate.

self over at pleasure, which will give him the advantage of warming first one side and then the other, as it may be most agreeable to his feelings.

As complaints should always be met at their first appearance, before the patient is exhausted by disease, in cases of very robust patients, it is often safest to take some blood before the Bath is applied, especially in the winter and spring seasons of the year. It sometimes happens, when the propriety of blood-letting may be doubtful, that the Bath produces partial sweating and temporary ease, but presently the perspiration suddenly dries up, and the pain increases. This circumstance will at once determine the necessity of blood-letting, which, in such an instance, will be found more effectual after the Bath, than it would have been if performed prior to its application.

In some instances, also, when the Bath is administered to patients inclined to be feverish, when blood-letting has not been premised, when the bowels need a cathartic, and especially when too small a cup has been used, an uncomfortable restlessness is felt. This circumstance, as well as a head-ache, if they continue any length of time after the Bath, should be relieved by some agreeable cathartic dose, and blood-letting when necessary.

In cases where it may be used with great decision, it commonly produces some throbbing of the head. When this appearance is considerable, the process may be discontinued, and if blood-letting is not necessary, the throbbing will quickly subside. In delicate cases, however, it ought not to be pushed up to this pitch; the fire should be lighted and extinguished alternately, as it may be found agreeable to the patient.

In cases of feeble and very old persons, the smaller cups ought to be used. And it ought to be repeated once every sixth hour, sometimes once every third hour. Meanwhile, the patient should be supported by nourishment and cordials. In such a case the intention should be to warm the patient effectually, but not to produce a sweat.

Sometimes it may be beneficial to remove the apparatus from the feet to the side of the patient, and so on alternately, as the judgment of the practitioner will quickly discover.

In cases of long standing debility, it sometimes happens, that the Bath is scarcely put into operation, before the patient feels distressing sickness and faintness. When this happens let the fire be extinguished, and give a glass of wine and water, with a few drops of laudanum, and when sufficiently refreshed, rekindle the Bath.

In almost every enfeebled case, it is necessary, after the Bath, to use jugs, or bottles, filled with boiling water, or hot bricks,

to aid the weak excitement of the surface, that it may retain the advantages gained by the bath; and in some cases blisters should be added.

There is no danger of taking cold. The gas which is used, is as free from moisture as atmospheric air. It will dry a damp sheet. Besides, in all the instances in which it has been used, I have not known one, by which the patient found any ill effects in that way. Indeed, if such a thing should happen, another application, and a little care, would perfectly correct every inconvenience.

When the patient is not much reduced, and seems to be too long coming into a state of perspiration, I commonly add more heat. If two or more cups cannot stand within the base of the bath, I place it upon them in any way I can, propping it up with bricks, or any other convenient support. The heat of two or three cups will be drawn up by the tube. If the patient complain too much, I remove one of the cups for a few seconds, and replace it so soon as the heat a little subsides. By this method my object is more speedily, certainly, and safely accomplished.

Fleshy patients, if treated with the Bath, should be heated in a gradual manner. If pale and short-breathed, the decision proper in ordinary cases might do much mischief. Indeed, in almost any case, where there is a long standing sallowness of complexion, it is not proper to force a sweat. In these cases, it may require many gently repeated trials before a natural state of the skin can be recovered. And in most instances of this sort, blistering, friction and cordials, as wine, &c. ought to be employed as auxiliaries to the Bath.

With suitable variation in the degree and continuance of the treatment, according to circumstances; the Patent Steam Bath will be useful in all the following forms of disease, viz:

In *Colds, Catarrhs, Croup, Asthma, Pleurisy* and *Fever* in its various shapes, whether intermittent, remittent, continued or nervous. In all these the application should always be *general and decisive*—taking care to begin the treatment on the first onset of the complaint.

In *Local Inflammation*, &c. such as *Sore-Breast*, in female cases—*Swelled Testicle*, *Anthrax* or *Carbuncle*, *Sore-Throat*, *Quinsey*, *Ear-Ache*, *Tooth-Ache*, when produced by cold, and in cases of abscess or imposthume. In these instances, the application may be *general* at night, and *topical* or directly upon the part affected, at any time in the day. Or if the one method prove ineffectual, let the other be tried also.

In *St. Anthony's-Fire*, *Nettle-Rash*, *Scald-Head* and such like affections,—in these the application may be made as in cases of local inflammation.

In *Suppression of Urine*, and other painful affections of the bladder—In *Cholic*, *Cholera-Morbus*, and in cases of *strangulated Hernia* &c. In these the application should be general and local, more or less decisive, and repeated as the exigency of the case may require.

In *Female Complaints* of a certain description, including *Difficult Labors*, *Floodings*; also *Hysteric Fits*, *Cramps*, and other *Hysteric Affections*—Here the application may be general, though sometimes it might be as well, to confine it to the lower extremities.

In *Piles*, whether blind or protruded. Let the application be very hot, and direct it upon the part affected—to be repeated as often as the symptoms make it necessary.

In *Bleeding at the Nose*—or in *Hemoptoe* or other recent case of *Hemorrhage*. The application should be general—repeating morning and evening—keeping the patient still and warm, and making a free use of table-salt—say a tea-spoon-full three times a day or oftener. And if necessary, use the following pill, viz: take Acetate of lead, six grains, opium, three grains; make six pills, give one morning and evening; but let the salt also be continued.

In *Excessive Fatness*—Let the application be general at night—to be moderately repeated next morning, and to be used twice or three times in a week.

In *Old Age*, and other *Feeble Cases*.—Here use the Bath instead of a warming-pan. Warm the patient in his bed night and morning, in all cold and damp weather, still directing him to remain in bed till nine or ten o'clock, and then let him get up to a fire, whether in winter or summer.

In *Gout*, *Rheumatism*, &c.—Sometimes the application should be local, sometimes general, as it may be found most effectual.

Lying-in-Women may be put to bed at once, in clean sheets and dry linen. Only applying the Bath immediately, so as to produce a gentle perspiration.

In the late fatal *Epidemic*.—Cases of this kind, might have been placed under the head of pleurisies, fevers, &c.

I have often used it with most satisfactory benefit, in cases of *Whitlow* and every kind of superficial inflammation. Its success in such instances, depends upon the same process in the vessels, which is excited by Dr. Physic, when he corrects a disposition to gangrene, by the application of a very large blister.

The following letter from Doctor Worth, of Guilford county, North-Carolina, addressed to the Rev. Edward Cannon, one of the presiding elders of the Virginia-conference, adds another instance of local disease, which deserves a place here.

DEAR SIR,

Being called on to attend a lady, who was supposed to have been bitten by a poisonous snake;* upon examination I found the symptoms which attend the bite of a viper, such as an acute pain in the wounded part, which was the foot, and a considerable degree of swelling, which extended up to a ligature, which had been early applied below the knee.

Several means had been used in vain, intended to remove the pain and swelling; the latter of which had become so great, that my patient was not able to move a joint below the knee; and this had been her situation for the space of three or four days.—I made an application of Doctor Jennings's Patent Bath, locally. Whilst it was in operation, my patient informed me, that the pain was much relieved, and that she was able to move her ankle. The application of the Bath only, a few times repeated, seemed to complete the cure.

DAVID WORTH,

* *This lady was bitten in the night.*

SIMPLE INFLAMMATORY FEVER, -

Commonly occurs in the healthful season. And cold alone, or combined with fatigue, may almost exclusively be considered as the remote cause.

After exposure, before going to bed, special care should be taken to secure an effectual warmth at the fire. If this precaution fail to produce a glowing excitement on the surface, or if an unusual length of time is required to become warm in bed, on inspection it shall be found that the roots of the hair are elevated, and a ligature tied on the arm, as in ordinary blood letting, will not distend the veins. These appearances universally indicate a forming predisposition to disease.

If a stretching, yawning, and chillness, with a dull or heavy aching in the loins or limbs attend, the predisposition is complete, and a fever may be confidently expected.

To correct this state of things, let the patient retire to bed, and receive an intensely hot Bath. If the bathing produce considerable head-ache, whether a perspiration is readily induced or not, blood-letting ought to be performed without delay. In such a case apply cloths wetted in cold water during the application of the Bath. And at the close of the process, some cathartic should be administered. In robust cases, say calomel, 10 grs. jalap, 15 to 20 grs.—In delicate cases, calomel, 4 to 10

grs. and oil. or some other suitable article, three hours afterwards: or, say purging salts from half an ounce to an ounce; cream of tartar one or two drams, and tartar emetic one grain. Dissolve the whole in half a pint of hot water.

Sometimes a single course of treatment is not sufficient to remove the predisposition—when this is the case, more or less of the symptoms stated above, will be felt the next day, and will mark the necessity of continuing the practice.

These instructions for correcting the predisposition to disease, are the more important, because it is within the reach of the most ordinary capacity to understand and execute all that is necessary. Whereas, after fever is formed, it may require accurate judgment to manage the patient in safety. To the people at large, the importance of my system will be most evident, in this. And this chiefly concerns the public. Who, will suffer a painful course of sickness, when it may be prevented in a way both pleasant and certain?

OF PLEURISY.

If, however, the symptoms heretofore described, marking the predisposition are not corrected, the chillness will increase, with an aching in the back and limbs, difficult and quick respiration, thirst, &c. and a pungent pain in the breast or side.

At this stage of fever blood letting ought to be repeated commonly as often as the pain returns. Before performing it, especially if the veins do not fill on tying on a ligature, the patient should be placed in bed, and the Bath put into operation. When the veins fill, blood may be let if necessary until the pain abates, and the bathing may be continued until a free perspiration is induced. Some suitable cathartic, may be administered, and the patient may take half an ounce of cooling solution once every third hour; say, take salt petre, 40 to 60 grains; cream of tartar, 60 to 90 grains; tartar emetic, 3 to 6 grains; water, one pint: a table-spoon-full is the ordinary dose. Early the next morning, the Bath may be repeated and the cooling solution continued. And as often as the fever rises or the pain returns, the same treatment will be proper.

In applying the bath in any recent case, and especially in cases of the pleurisy, and other forms of inflammatory fever, I sometimes use two or more cups. The largest is kept continually burning, and the least is introduced and removed alternately, according to the degree and continuance of heat which the patient can conveniently bear.

The more violent the attack, and the greater the pain, the more speedy and intense should be the application of the Bath;

and the cure will be the more speedy and decisive. There is much more danger in a temperate than a violently hot Bath. In decision there is nothing to be feared.

If the disease is not corrected by this method, in two or three days, it may be concluded that the lungs are much injured, and a large blister eight by ten inches square, should be drawn upon the affected side. Afterwards proceed as above advised, till the patient is recovered.

With a little variation in extent and severity, and with some reference to the seat of the pain, similar management will succeed in every possible mode of recent disease.

INFLAMMATION OF THE BRAIN,

Is inflammatory fever, in which the morbid determination of excitement is turned upon the head. The peculiar symptoms attending it, are a violent pain of that part; an inability to bear light or noise; great restlessness; and commonly a small, tense pulse, though sometimes it is full and strong. In other respects the appearances are the same as those describing inflammatory fever. I might add, however, that it is frequently attended with very obstinate costiveness, insomuch, that the most violent cathartic medicines are used in vain.

In this case, blood should be let freely, and as often as the violence of the symptoms make it necessary; observing to defend the head with cold applications, especially during every application of the Bath. Drastic cathartics should be daily administered; and in cases of great violence, the intestines should be continually under their influence for two or more days; say aloes, 60 grains, gamboge, 20 grains, calomel, 20 grains. The whole may make 24 pills; 3 to 6 may be given once in 6 hours, according to the violence of the case. To be followed by a dose of oil, or some gentle cathartic. Or jalap, aloes, calomel, castile soap, of each sixty grains. Make of the whole together sixty pills. The dose may be from 3 to 8 at discretion. The feet of the patient should be kept carefully warm, and if the pain be obstinate, a large blister should be drawn upon the back of the neck. Light should be excluded, and silence constantly observed.

As in pleurisy, so also in this mode of fever; if the veins do not fill upon tying on the ligature, let the Bath be applied before any very decisive blood-letting is performed.

It might be remarked here, however, that there is one kind of head-ache which is seated in the pericranium and hairy scalp, or the external covering of the head. It is produced by cold.—Soreness is felt in moving the scalp with the hand. In this

sort of head-ache, the Bath will succeed without blood letting.

INFLAMMATION OF THE LIVER,

May be known by a dull pain in the right side, under the short ribs, extending into the right shoulder; sometimes affecting both sides, and felt in both shoulders, with great costiveness and dejection of spirits. Other appearances are such as attend simple inflammatory fever, except that the pulse is commonly less tense and the appearances generally, less violent.

In this case the treatment will also be similar.—Bathe and bleed. But the blood-letting will not be as frequently necessary. Cathartics will be highly useful, to be daily administered, as long as the violence or obstinacy of the pain makes it necessary; and in bad cases, a large blister should be applied over the region of the pain.

At the close of a case of this sort, continue the Bath twice or three times a week, after the patient seems to be on the recovery; to be applied at night. The following morning, as much mercurial ointment as would be equal in bulk to an ordinary chesnut, may be rubbed upon the right side. In making this application, the patient should sit near a good fire, and the friction should be pretty intense. After the operation, he should retire to bed, and rest till he is quite refreshed. This practice should be repeated every week, till all pain and soreness is removed out of the region of the liver.

INFLAMMATION OF THE STOMACH, BILIOUS CHOLIC, AND CHOLERA MORBUS.

In these cases, the stomach commonly rejects every kind of medicine, whilst an alarming abandonment of the surface, and a corresponding violent introversion of excitement, threaten speedy destruction. Apply intense heat to the surface, repeat blood-letting as often as the pain makes it necessary, aiding the inténction with appropriate doses of calomel, repeated every sixth hour, with mild injections at the close of each period; say calomel from 6 to 20 grains, varying the dose according to the strength of the patient. In cases of cholera morbus and of the dry grypes, I sometimes use the common salts, cream of tartar and tartar emetic, after a decisive Bath with great effect. If it should be protracted, however, and especially if the vomiting or pain should be obstinate, a large blister should be applied over the region of the stomach or abdomen.

These reflections upon inflammatory fever, are predicated upon the supposition, that they occur as the primary affection, and,

of course, as having been induced through a predisposition with an increase of excitability. But it sometimes happens that similar appearances take place, as symptoms of fever in different seasons of the year. It is therefore necessary, in every instance, to mark the quantity of strength which may be present in the system, and to adjust the treatment accordingly. If the excitability be nearly or quite entire, the evacuations should always be decisive. If there be some degree of prostration, the management must be more delicate, as the prostration is extended. Speedy and sprightly reaction after depletion, always indicates a goodly stock of excitability.—Depletion, followed by a languid pulsation, a collapsed surface, and emptiness of the veins, always evinces an exhausted state of the sensorium.

INTERMITTENT FEVER, OR AGUE,

Seems to have for its primary remote cause, marsh miasmata, which partially weaken the system. The disparity of temperature however, between the night and the day is a secondary remote cause, hastening the production of a morbid accumulation of excitability upon the central vessels. Probably vernal intermittents occur in some regions, under the same circumstances which produce violent pleurisies in others.—So that, whatever other considerations might be associated with our views of an intermittent, cold has the most considerable agency in its production.

To prevent the formation of a predisposition to the ague, good fires should be kept up every night and morning throughout the whole year.

To cure the ague when actually formed, the time of its accession ought carefully to be anticipated, by applying the Bath an hour or two before the ague comes on. And in most cases so soon as the bathing is ended, the patient should take a cathartic. Sometimes blood-letting also is useful in curing agues in robust cases. If no painful symptom is produced by the operation of the Bath, blood-letting may be omitted in every instance. If the Bath and cathartic medicines fail, wine and bark, in the usual way, may be used in time of the intermission, which, under such circumstances, will hardly fail to succeed, when aided by the Bath. Perhaps the following is the best general method of taking this article :—bark, 1 ounce; cream of tartar, 1 ounce; powdered cloves, 1 dram and a half, ground together, and divided into eight doses. Four doses a day, to be taken in time of the intermission. If the fever should continue after the Bath and bark, as advised; I should draw a large blister, repeat the Bath and advise the daily use of good

fires. If the liver seem to be involved, I should use calomel and mercurial ointment, as advised under the head of hepatitis, or inflammation of the liver.

In managing small children, I commonly advise a flannel-waistcoat, which is to be moistened every night with a little of the following tincture. Say, bark one ounce, cayenne pepper or common red pepper, one fourth of an ounce, brandy, one pint. This is put on at bed-time, to be kept on till the following night, and then wetted again as before. This in addition to the Bath, particularly in long standing and obstinate cases.

REMITTENT FEVER

Seems to occupy an intermediate grade, between simple inflammatory and continued fever. The predisposition is induced by the heat and poisonous gases prevalent in the summer. These, as remote agents cause debility. Cold induces a collapse on the surface—and that accumulation of power is thrown upon the central vessels, by which the storm of fever is raised. The more sudden it is brought about, and the more robust the patient, the nearer the appearances will be assimilated to simple inflammatory fever, and the contrary.

The predisposition may be prevented by avoiding all excess of labour, diet, loss of sleep, &c. and by warming at the fire every morning and evening, when its first accession is threatened. After the predisposition is formed, or the fever has actually commenced, the same principles and precautions are to be observed, which have been stated above—remembering only, that as there is greater prostration, less depletion can be safely borne than in inflammatory fever.

For the cure, bleed and bathe—or bathe and bleed—or bathe only; according to the urgency of the case, and the state of the surface. Then give calomel and jalap, or calomel followed by a dose of oil, every day if necessary, till the symptoms abate.—When oil is offensive, any other gentle dose may be preferred; say salts, cream of tartar and tartar emetic.

Afterwards, use the Bath in the morning, and a gentle cathartic in the course of the day, for two or three days, gradually laying aside the practice as the symptoms disappear. If the symptoms seem obstinate, a blister should be drawn upon the region of the stomach. If a grown person, say 8 by 10 inches in size. And for a few times use the Bath decisively.

CONTINUED FEVER,

Is ushered in by a predisposition which differs from that of a remittent fever in nothing, except that the exhaustion of strength is greater. The same management, therefore, will be proper to prevent the predisposition, and the treatment may be similar for curing the fever when formed, remembering only, that there is less necessity of blood-letting in this, than in the former case—and that drastic cathartics, for the same reason, are not as frequently to be used. In this, and some instances towards the close of remittent fever, the following is a proper cathartic dose; rhubarb, 25 or 30 grains; manna, 2 drams; Rochelle or glauher salts, 2 drams. The whole for one dose, for a grown person, to be dissolved in a little hot water. Thirty or forty drops of the spirit of nitre, diluted with a little cold water, may be given once every second hour; and plentiful dilution such as chicken water, table tea, apple water, toast and water, &c. may be constantly used at discretion.

In this grade of fever, the Bath should be used every morning and evening—most decisively in the morning.

In remittent and continued fevers, it sometimes happens that determinations take place, threatening injury to some of the vital organs. If this should happen, and continue after using the Bath a few days, a large blister should be drawn. I indeed, if the case be tedious or obstinate, blisters are useful without exception.

TYPHUS OR NERVOUS FEVER.

Typhus fever is the most distinct exhibition of disease consequent upon exhausted excitability. In this form of fever, debility so prevails, and the abandonment of the surface is so complete, that the skin is almost left without a supply of blood.—The eye-lids are not sufficiently expanded to cover the eyes—the skin appears to cleave to the breast bones and ribs; and the surface, generally, is dry and husky. The limits to which the feeble excitement is reduced, are so contracted, as to be scarcely sufficient to expend the slow production of excitability: and determinations upon the muscles, evinced in nervous twitchings, or wild mental effort in form of a delirium, are employed by the system to maintain an equilibrium.

This grade of disease may have for its remote cause, the pernicious gas exhaled from a cellar or prison—or some region of atmosphere more extended, sometimes limited to a family or neighborhood—sometimes spread over an extensive section of

country. It may also be produced by loss of sleep, by excesses, by unwholesome or insufficient diet, &c. &c.

The predisposition is attended by unaccountable debility, great propensity to sleep, giddiness of the head, and an unusual inclination to be near the fire. As the case progresses, some pain is felt in the back part of the head and neck, aching in the loins and limbs, &c. &c. which gradually increase, till the disease is completely formed.

Sometimes rest and composure for a sufficient length of time, will correct the predisposition. But a moderate use of the Bath for a day or two, every morning, resting in bed afterwards for the day, would contribute much towards the certainty of the effect.

After the fever is formed, first administer a Bath with a small cup, then an emetic, followed by a gentle cathartic. For the emetic, give 5, 10, 15, to 30 grains of ipecacuanha. For the cathartic, give the dose above advised under the head of continued fever; viz: rhubarb, manna, and Rochelle-salt; or common purging salts. Afterwards, a daily repetition of the Bath when necessary, in the gradual way. Between the repetitions of the Bath, the surface should be defended by the application of jugs filled with boiling water or by hot bricks, frequently renewed, to prevent a declension of the warmth, which should be kept up, so as to avoid a repetition of the collapse. An occasional repetition of a suitable cathartic, cordial drinks; as panada, chicken broth, wine and water, and to quench thirst, a little of the spirit of nitre, as before advised. In this, and every grade of fever where depletion is not necessary, a large blister drawn on the region of the stomach frequently contributes to hasten recovery.

GOUT AND RHEUMATISM.

Gout and rheumatism are the result of morbid determinations upon the joints or muscles, or sheaths of the muscles or tendons. —The Bath, with or without depletion, according to the state of excitement, will generally afford relief. It should be used so far and repeated so often as may be necessary to secure and maintain a determination of excitement upon the surface. A young man in Lynchburg who was violently afflicted with a pain in the hip, tried the Bath in the usual way without relief. He then tried two at once, and at length he had four applied, all in operation at once—one at his feet, two on the affected side, and one on the other side. The heat was very great indeed, and it almost entirely relieved him in one night. He is a bricklayer, and the next day went to work. Two Baths with two cups each

would have had the same effect. In chronic rheumatism a tincture of guaiacum is a useful remedy. Take proof spirit, one pint : gum guaiacum, one ounce.—A spoonful or two to be taken night and morning.

If the appearance should be obstinate and inflammatory, after using the Bath decisively, as advised in pleurisy, the patient may be bled. The bowels should be regulated as in every other form of disease ; and if necessary, the following liniment should be applied to the parts most effected, viz :

Take spirit of wine, or high proof spirit of any kind, one quart ; spirit of turpentine, one pint ; cayenne, or red pepper, half an ounce, or an ounce ; and camphire, half an ounce.—Shake up the preparation when used. Cotton or flannel cloths of suitable size, may be moistened with the liniment, and applied at discretion. Bags of heated sand, moistened with salt water, is an excellent intermediate application.

CROUP OR HIVES.

In this form of disease Dr. Rush makes two distinctions.—The first is marked with spasm and dry cough. The second is nearly freed from spasm and the patient is able to cough up a considerable quantity of phlegm. For the cure in either case, give a decisive Hot-Bath.

If the difficulty of breathing, or a flushing of the face, with pain in coughing, continue after a decisive bathing, the patient should be bled, and if necessary the bleeding should be repeated. If the symptoms continue after the bleeding, repeat the Bath.—Then give 5 or 6 grains of ipecacuanha, with 2, 3, or 4 grains of calomel or turpeth mineral, or a tea-spoonful of antimonial wine ; or, if it can be procured, 10 to 20 grains of powdered seneka, sometimes called rattle-snake root. Either of these doses may be mixed up in honey, and should be repeated every 20 or 30 minutes, till it produces the intended effect. Calomel, 3 to 9 grains, with jalap, 8, to 18, or 20 grains, may be used as a cathartic. Similar treatment will suit most cases of asthma or phthisic.

CHOLERA INFANTUM, OR PURGING AND VOMITING OF CHILDREN.

In places where this complaint prevails, cloathing should be carefully accommodated to the state and changes of the weather.—Salted meat should be daily but moderately used through the sickly season. Good sound wine may be given them in portions adapted to their age, from a tea-spoonfull to half a wine glass

full, at the discretion of their parents, especially, mornings and evenings. Particular regard should be had to cleanliness, both with respect to their skin and clothing, and when it can be done, sickly children should be removed to the country before the sickly season.

A well timed Bath will commonly prevent the disease from fixing itself, in almost every case.—Keep up a little fire morning and evening throughout the year, and let the children be encouraged to use it.

Dysentery, or Bloody Flux.

On the first appearance of this disease, apply the Bath, decisively, and give a free dose of oil; and if the pains and other violent symptoms continue, blood-letting must be repeated every twelve or twenty-four hours.

Pukes are sometimes proper, but they should be used only when there is great sickness at the stomach. Frequent cathartics, but they must be of the most gentle sort, as cream of tartar, purging salts, manna, castor oil, &c. one of these should be used every day while the disease continues.

Glysters of flaxseed tea, or mutton broth, with a little tincture of opium, should be injected three or four times for every twenty-four hours.

A dose of the tincture, or a pill of opium, should be given every night; and after sufficient evacuations, it might be used every six or eight hours, if necessary.

Whey, flaxseed tea, camomile tea not too strong, mallows, tea, and barley water, are all proper drinks. And if there be much fever, cold water is very proper.

A large blister drawn on the abdomen, is necessary in obstinate cases. A decoction of white oak bark is an excellent astringent drink, in cases of long standing. Or a decoction of the root of the chinquepin tree is preferable to all other astringents, when it can be had.

During the whole course which may be required to effect a cure, it is proper to use the Bath moderately, every morning and evening, or oftener, and to maintain its effects by the aid of jugs filled with boiling water, or hot bricks, frequently renewed.—But if the Bath be properly used on the first appearance of the disease, little else will be necessary in any ordinary case.

Chronic Aphthae, or Diarrhoea.

Bowel complaints are commonly instances of introverted excitement. It is all important, therefore, in effecting their cure,

to secure a return of the circulation to the surface. The Bath will aid in the accomplishment of this intention in every case. Its decisive powers will be most certainly evinced upon the first onset of the complaint. Yet it is equally important in cases of standing, though it requires more additional aid : For instance, chornic diarrhœa, which is always attended with a dry skin, will be more certainly relieved by the aid of this remedy. During the intervals of bathing, the liniment recommended in rheumatic cases, should be freely and extensively used, and the following bolus may be taken at discretion, viz : Take of gum champhire, 30 grains ; opium, 3 grains ; volatile salt of hartshorn, 30 grains ; ipecacuanha, 4 grains : syrup, as much as is necessary to prepare the bolus : the whole to make six doses ; one to be taken every sixth, eighth, or twelfth hour, according to circumstances. In some instances it is very useful to draw a large blister on the abdomen, to be repeated as often as it heals, till the disease becomes completely manageable without it. Sometimes, too, it is highly useful to precede the Hot Bath, by a general washing of the skin, with a cloth wetted with soap-suds or proof spirits.—There is no danger of taking cold from this practice, if the Bath be immediately employed. Drink daily of the decoction of the chinquepin root.

CHOLIC.

Cholics may be the effect of irritation, inflammatory action, or spasm. In either case the Bath will afford relief. Aided by cathartics and blood-letting it diffuses excitement, lessens the force of the introversion, and extinguishes the accumulation of excitability, upon which the spasm or cramp depends. After an attack of the cholic, some appropriate cathartic ought to be repeated.

FEMALE COMPLAINTS.

When certain delicate circumstances suddenly stop, or come on too slowly, attended with pain, the Bath should be used at night about the particular time. Then give a portion of calomel and aloes, three or four grains each. Syrup of some kind may be added so as to form it into a pill or two, or so much as to make it of the consistence of honey. Continue the Bath, and calomel and aloes, for three successive nights.

These peculiarities sometimes come on too often for the strength of the patient.

In such cases, in every instance, let the patient take the Hot-Bath, to be followed immediately by a dose of opium, or lauda-

num. If opium, say from one to two grains. If laudanum, from 25 to 60 drops; and, if necessary, repeat the same every sixth or eighth hour, gradually laying it aside.

If too much exercise be the cause of disease, rest, of course, is indispensable for effecting a cure.

When too strong motion of the arteries can be ascertained as the cause, gentle bleeding and purging, occasionally repeated will afford important aid.

If much weakness, paleness and a disposition to bloat attend, give half a grain of opium every sixth hour, and at intervals of three or four hours, give twelve or fifteen grains of an equal mixture of allum and gum kino, to which may be added a drop or two of the oil of cinnamon: regulating the bowels if necessary, with, say, calomel, 3 grains; rhubarb, 20 or 30 grains.

Sometimes a particular appearance of a whitish complexion, &c. &c. presents itself instead of the natural one, and is very troublesome. For the cure of this case give wine and iron, using the Bath two or three times a week. It is sometimes of service to use a mixture of turpentine with honey; each in equal quantity, a tea-spoonful the dose—to be taken three or four times a day.

FLOODINGS, &c.

In violent floodings, under whatever circumstances induced, with or without the aid of blood-letting or opium, the Bath will be found an invaluable remedy. A morbid determination of the blood to the parts concerned, with an associate abandonment of the surface, is the disease. The intention for effecting a cure, must therefore be obvious to common sense.

PILES.

Most fleshy persons, and more commonly those who lead sedentary lives, are subject to the distressing complaint called *piles*. If the attack be of the more moderate kind, a gentle dose of cream of tartar and flower of sulphur combined, will afford relief.

An occasional use of the Bath will invite the circulation to the surface, and very much aid the cure. An ointment impregnated with the virtues of the leaves of Jamestown weed, (*stramonium*) is highly recommended. This ointment is prepared by frying a few of the green leaves in fresh butter or sweet oil, adding a little bees-wax, to give it proper consistence.

STRANGURY.

A painful inclination, and an irresistible straining to urinate, whilst very inconsiderable discharges are effected, mark the disease called strangury. In such a case, apply the Bath frequently every day. If inflammatory appearances attend, let blood. — And between the repetitions of the Bath, jugs or bottles filled with boiling water, or hot bricks wrapped in moistened cloths, may be applied to the seat of the pain. As a cathartic, say, manna, one ounce, dissolved in hot water, to which add sweet oil, from 1 to 4 ounces; let this dose be repeated at discretion. — Frequent injections, may be added if necessary. Thirty or 40 drops of the spirit of nitre, in a little barley water, or melon-seed tea, may be taken frequently, as the patient's drink. And after the bowels are properly emptied, 30 or 40 drops of laudanum will scarcely fail to procure ease.

AN EXCELLENT METHOD FOR PREVENTING AFTER-PAINS.

So soon as the patient is put to bed, apply the Bath pretty decisively. Then give 30 to 60 drops of laudanum. In most cases, about eight hours afterwards, give a cathartic, say, manna, half an ounce, salts, half an ounce, dissolved in an infusion of senna, or give a dose of castor oil. So soon as the cathartic operates, repeat the Bath and laudanum. Afterwards, a daily moderate repetition of the Bath morning and evening, with a gentle dose of laudanum at night, keeping the bowels in a proper state, will seldom fail to prevent an attack of child-bed fever.

No special restriction of any sort will be necessary, and in a few days the patient will be quite recovered.

TYPHOID PNEUMONIA, OR COLD PLAGUE.

The prevailing epidemic, known in different sections of the country by different names—in the western states, by the appellation of the *cold plague*, is properly a grade of typhoid fever. — In regions where it rages, there must be present some poisonous agent, which debilitates the organic movements of the system; or else there is a want of something in the atmosphere, upon a full supply of which, the vital functions are dependent, for a perfect state of the powers of life. Through this abridgment of the vital energies the system is placed in a condition which renders it unable to diffuse the circulation, with complete and equable impetus, throughout the whole mass.—Those vessels most remote from the centre of motion, must languish most.—

Hence the surface is first enfeebled, and external cold must act first and chiefly upon the surface. Of course it follows, that persons having previously been in feeble health; those who are badly clad—those who live in cold houses, or are badly supplied with fuel for fires, and especially such as are exposed to fatigue and the weather, or drink to excess, will furnish the greater number of instances of this form of disease. The enfeebled surface under the influence of cold which it is not prepared to resist, is imperceptibly brought into a condition approximating to a state of death; whilst the powers of life repelled from the surface and concentrated upon the vital organs, produce a storm of excitement, which threatens speedy destruction.

The excitement, thus pent up, determines upon the head, upon the chest, and upon the glands of the throat—&c. &c.

Upon this theory of the disease, blood letting must necessarily, in many instances, be pernicious. By the sudden loss of blood, the surface, almost deprived of life, is instantly left destitute of excitement: that is, reduced to a state of death.—No measures within the reach of human power, in such a case can afterwards prevent the destruction of the patient.

For the cure, the first intention should be, by the application of heat, in some way to restore the due proportion of excitement to the surface—And this can be done more speedily and effectually, by the agency of the Patent Steam Bath, than any other means.

After the use of the Bath, the bowels should be cleared by a gentle, but brisk cathartic:—say salts, senna and manna. In cases known to be robust a dose of calomel and jalap might be preferable. After the operation of the cathartic, the Bath should be repeated. And in any very alarming case, it would be highly useful to wrap the patient in a blanket, wrung out of heated spirit of very high proof, in which a portion of spirit of turpentine, has been previously dissolved. Possibly, in some instances this treatment might supercede the necessity of blisters. If however, the throat be considerably affected, a blister ought to be applied to the neck, to extend, down the back or breast, so as to secure a blistered surface equal in area, to an hundred or an hundred and twenty square inches—A second or third cathartic may frequently be found necessary:—But no blood letting should be tried, until the excitement of the surface is, by some means, first properly secured. Afterwards blood-letting might be repeated if necessary at discretion.

The explanation here given, of this alarming complaint, will account for its appearance, without referring to any thing like contagion. And regular living and a constant use of good fires, will be found generally effectual to prevent its assault.

ST. ANTHONY'S FIRE,

In this complaint use the Bath once or twice in twenty four hours. In the mean time regulate the state of the bowels as there may be occasion.

MEAZLES,

In this complaint when too slow in making its appearance, one or two repetitions of the Bath, brings it forward immediately. Again, at the close of the disease, if any determination is threatened to the lungs, or bowels, a few moderate applications of the same remedy, keeping the patient warm, will commonly prevent the danger.

GENERAL REMARKS.

In managing sore-breast, swelled testicle, carbuncle,* sore-throat, quinsy, ear-ache, tooth-ache, whitlow and any other instance of local inflammation from a cut or a bruise, let the Bath be used locally, as often as the case seems to require it. And if the system appears to be feverish on the general scale, use the same method proposed in case of inflammatory fever.

By using the foregoing directions as general rules, and applying them to similar appearances, in whatever case they may occur, it will quickly be found, that these few pages contain all that is necessary for common family use. It will be ascertained that disease is a unit in its nature, that its different appearances depend upon the different degrees of strength only in the patient; and that some accidental or constitutional circumstance must concur, where it assumes a local determination.

Such is the cause wherefore, one man is commonly subject to a pleurisy, another to an asthma, a third to a cholic, a fourth to a rheumatism,, &c. &c. Some have weak lungs, others a weak stomach. others by hard labor or by constitution are liable to disease in the muscles, that is the flesh &c.

Before I conclude I must once more particularly request every individual, who may use the Bath, to be careful to have a suitable frame; and always to let the application be made as much as possible, to the naked skin. In robust and recent cases, the more expeditiously the perspiration can be induced, the more effectual. And let it never be forgotten, that a tepid Bath in cases of inflammatory action is a great deal more dangerous,

* Carbuncle is a painful tumor something like a Boil, but much larger, seeming to have many distinct heads, and commonly appears upon the back.

than one which would commonly be thought extravagantly hot. Begin in time, therefore, be decisive, and there is nothing to fear.

It should also be carefully remembered, that in any and every case of long standing, in which the powers of life are considerably exhausted, if this remedy be tried, it should always be directed by the hand of experience. And that nothing can be more absurd, than to expect an immediate recovery in cases which necessarily require both time and good management for effecting their cure.

I therefore take this occasion most earnestly to request all common judges to confine their practice to recent cases. To use their exertions rather to prevent disease in its first approaches, than to make experiments where the complaint is scarcely manageable in the hands of experienced Physicians.

I must also add my protest against the use of the Bath, if it is proposed to proceed in a way regardless of that information which I offer upon the subject, and which is the result, of ten years labor and vigilant attention.

Indeed it ought to be considered an act of great injustice to me, when any man uses the bath as my remedy, and yet pays no regard to my prescription, which ought always to be associated with its use. Plain, honest men, of good common sense, have had uniform success. They observe my instructions. The same should be done by all who use the invention, not even excepting the most skillful medical men ;—at least so long as is necessary to gain a complete experimental knowledge for themselves. Inattention to this important consideration I have no doubt has frequently been the cause of disappointment.

Instances have occurred where the Bath has been tried in vain upon hopeless patients—cases in which, in truth, its reputation ought not to have been held as implicated in any degree. It must be very illiberal, to condemn my practice for failing to restore such patients, as have been first worn out under a long course of the most powerful medicines, which have been tried in vain ; especially when it has so often succeeded in affording relief where all other remedies have proved ineffectual.

Failure has not uncommonly been the consequence of too timid or partial trial. I myself have known some cases, in which, if it had been sufficiently repeated, it would have saved the patients, but by dropping it improperly, they became worse, than if it had never been tried at all.

An anonymous publication appeared in the Aurora, in the Autumn of 1815, which has been copied into most of the prints which I have seen, purporting to be an extract from an old Dutch

Work, and describing something very similar to the Patent Vapor-Bath. This work is ascribed by the author of the newspaper scrap, to a certain Stephen Blancard of Leyden, in Holland, and is said to have been published in the year of our Lord 1693.

Upon this authority, the Professor of *Materia Medica* in the University of Pennsylvania, in the course of one of his lectures last winter, I am credibly informed, asserted, that I had no right to the benefit of the invention.

Of this work of Stephen Blancard, I know nothing besides the above mentioned paragraph in the *Aurora*. But I have read the works of Boerhave and Van Swieten, two of the most distinguished writers of the University of Leyden, and who must have been cotemporary with Blancard. These, of course, ought to have known something about this invention, if it then had an existence; or if they had thought it worthy of notice. But the name of Blancard I believe, is not mentioned in their works.

It is true that Van Swieten prescribes the vapors of burning alcohol for one single complaint;—that of a carious bone, and barely speaks of it as a very dangerous expedient in venereal cases: insomuch that his account of it, was better calculated to exclude, than to give it a place upon the catalogue of useful remedies.—And it appears to have had that effect.

For if it should be ascertained, that Blancard offered an improvement in the mode of making the application, still the silence of the medical world for a whole century, unanswerably proves, that the fears which were raised by Van Swieten, were sufficient to put down Blancard's improvement.

It follows therefore, that even had I known of this old Dutch book, that there was abundant room, for a further and additional improvement.

And admitting such a work to have had an existence, I might ask what was the community the better for it? And is it not a little curious, that it should have been so long hidden from so many much more learned physicians, and at last after remaining useless an hundred years, that I should have stumbled upon a thing forgotten, although published to the world? At least then I may say, it was as fortunate for humanity as for me, that this obsolete remedy by chance fell in the way of one, who has taken the necessary pains to bring it into use; though at this late date.

Might I not continue to ask if it was known, and proved to be that valuable agent which it now appears to be, wherefore was not its use continued? Or is it possible, that it could have been known, in the way I use it, and afterwards not have been spoken of in Europe or America, for a hundred years?

Besides, in the year 1693, disease was known, described and treated upon the nosological plan only. Remedies of every kind

were considered as having specific reference, each to some particular disease, or very nearly so. It follows, therefore, that the Vapor-Bath, in the character in which I offer it to the world, assumes a form truly original, although it were admitted, that something like it was known to Blancard, or to any other person the century before the last.

However great or little, the credit due to the mechanical and chemical association which constitutes my apparatus, I place my chief calculations for intellectual merit, in the theory which led to its invention.

Who before me ever thought of curing inflammatory fever by the agency of heat?—Of heat too, so intense as to produce painful sensation?—as high as 110, 120, 150 or more of Fahrenheit?

Who before me proposed the use of heat, as a general remedy, for the prevention and cure of disease in any of its incipient forms?

Who before me proposed a metallic tubular stove so constructed as to be carried in a port-manteau, travelling trunk, saddle-bag or pocket; so handy that travellers might be prepared at any place, to correct a predisposition to disease in one night, and proceed on their journey the following day? Or who ever before me proposed to bring it into general use as a family article, which, in a large family, might be of daily use.

Whoever first thought of it, the honest truth is, it remained to be my privilege, to bring to the knowledge of the present and future generations, this simple, easy, and pleasant method of preventing and curing so many of their maladies. And how was I to enable myself to progress in this arduous work, in opposition to a host of hindrances, but by pursuing that course, by claiming those rights and emoluments, provided by our wise and happy government for the promotion of *improvements*? This I have done. And by my patent and the laws of the United States, I am guaranteed for the term of fourteen years, in a way which will put it in my power to persevere, in defiance of all the deduction with which I may have to encounter. And the friends of the Bath will multiply as the community continues to discover it to be their interest to patronize my improvement.

SAMUEL K. JENNINGS.

P. S. My claim to a Patent-Right, is predicated upon a declaration, that “I had an *improvement*, and that I did verily believe myself to be the true inventor or discover of said improvement;”—This is obvious from the reading of the patent. And if Mr. Fulton could put in a just claim for his improvement, by the same rule also, I am entitled to mine.

THE UNITED STATES OF AMERICA:

TO ALL TO WHOM THESE LETTERS PATENT SHALL COME.

WHEREAS, SAMUEL K. JENNINGS, a citizen of the United States, hath alledged, that he has invented a new and useful improvement, being A Portable Warm and Hot Bath; which improvement, he states, has not been known or used before his application; hath made oath that he does verily believe that he is the true inventor or discoverer of the said improvement; hath paid into the treasury of the United States the sum of \$30, delivered a receipt for the same, and presented a petition to the Secretary of State, signifying a desire of obtaining an exclusive property in the said improvement, and praying that a patent may be granted for that purpose:—These are therefore to grant, according to law, to the said Samuel K. Jennings, his heirs, administrators or assigns, for the term of fourteen years, from the twenty first day of January, one thousand eight hundred and fourteen, the full and exclusive right and liberty of making, constructing, using and vending to others to be used, the said improvement; a description whereof is given in the words of the said Samuel K. Jennings himself, in the schedule hereto annexed, and is made a part of these presents.

(L. S.) In testimony whereof, I have caused these letters to be made patent, and the seal of the United States to be hereunto affixed.

Given under my hand at the city of Washington, this twenty-first day of January, in the year of our Lord one thousand eight hundred and fourteen, and of the independence of the United States of America, the thirty-eighth.

JAMES MADISON.

By the President,

JAMES MONROE,
Secretary of State.

Book taken apart, leaves deacidified
with magnesium bicarbonate. All
leaves supported with lens tissue.
Resewed on linen cords with new all-
rag and paper signatures, unbleached
linen hinges & hand sowed headbands.
Rebound in quarter Russell's oasis
moreocco with hand marbled paper sides
& vellum corners. Leather treated with
potassium lactate & neat's foot oil
& lanolin. June 1979.

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